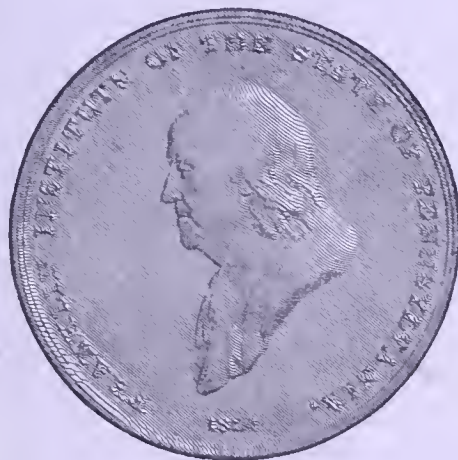


CATALOGUE
OF THE
FRANKLIN INSTITUTE
EXHIBITION.

9

1874



1874

OPEN FROM THE 6th TO THE 31st OCTOBER, 1874,

At Thirteenth and Market Streets, Philadelphia.

PHILADELPHIA:

PUBLISHED BY JACKSON BROTHERS, 404 LIBRARY STREET.

Entered according to Act of Congress, in the year 1874, by Jackson Bros., in the
Office of the Librarian of Congress, at Washington, D. C.

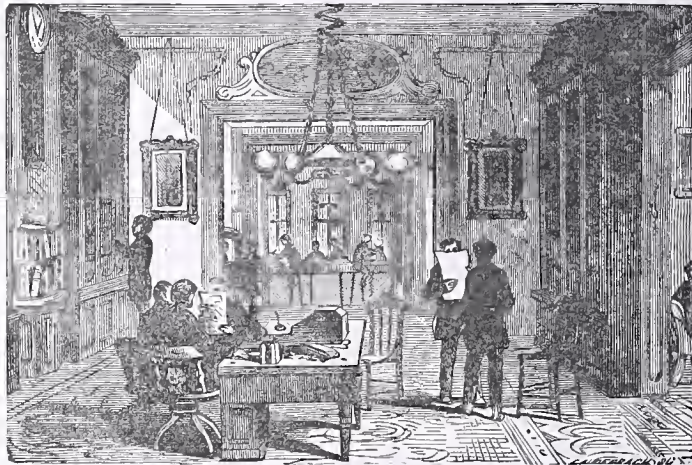
HOWSONS'

United States and Foreign

Patent and Patent Law OFFICES,

Established 1853.

NO EXTRA CHARGES.



INTERIOR OF PHILADELPHIA OFFICES

NO CONTINGENT FEES.

Principal Offices,
119 South Fourth St.
PHILADELPHIA.

Branch Offices,
605 Seventh Street,
WASHINGTON.

PROPRIETORS:

HENRY HOWSON, Engineer, and Solicitor of Patents.

CHAS. HOWSON, Attorney at Law, and Counsel in Patent Cases.

ADDRESS,

HOWSON & SON,
PHILADELPHIA.

CATALOGUE

OF THE -

Franklin Institute Exhibition

1874.

LIST OF EXHIBITORS.

NOTE.—The letter and figure at the beginning of each line designate the Section of the building in which the Article can be found, and the accompanying Plan shows the location of the Sections.

E 11	Ash, John S., Bucks County, Pa.	Water Power Pump.
A 7	Altemus & Co. . . Philadelphia.	Albums.
F 3	Atmore & Son,	" Mince Meat, etc.
B 7	Adjustable Table Co.	" Sewing Machine Table.
E 9	Ainsworth, E.	" Machinists' Supplies.
C 3	Andrew, Fred. H.	" Afghan.
D 11	Austin & Obdyke,	" Corrugated Exp. Water Conductor.
E 10	Ashton, E.	" Worsted Doubler.
B 5	Albrecht & Co.	" Grand and Square Pianos.
E 1	Allen, Samuel H.	" Harness Ornaments.
F 11	Allen & French,	" Automatic Gas Regulator.
A 6	Allen Brothers,	" Furniture.
D 7	American Reflector Co.	" Day and Gas Light Reflector.
B 6	Amer. Button Hole and Sewing Machine Co.	Philada. Sewing Machines
E 1	American Tubular Iron and Steel Assoc'n,	" Steel.
G 5	American Machine Co. Philad'a.	Crown Clothes Wringer.
C 11	Applegate, A. & R. O.	" Centennial Ironing Table.
E 9	Alexander Bros.	" Boiler and Belting.
F 2	Bartol, H. W.	" Beet Sugar.
B 8	Baker, John C. & Co.	" Cod Liver Oil.
F 7	Bacon, Murray,	" Rotary Circular Saw.
A 3	Barlow, C. Joseph	" Designs in Paper Hangings.
B 9	Bailey, F.	" Ready Mixed Paints.

D 9	Baker, Arnold & Co. Philada.	Gas Fixtures.
F 2	Barker, George R.	Heating and Ventilating Apparatus.
F 10	Baugh & Sons,	Sectional Mills, different sizes.
G 2	Baker, Charles Henry	Self-Guaging Bessemer Tuyers.
D 7	Bancroft J. A. & Co.	School Apparatus.
E 5	Bement Wm. B., & Son,	Machine Tools.
E 3	Belfield, H. & Son,	Steam Gauges.
C 6	Benner, Joseph	Sewing Machines.
A 9	Bennerman & Wilson,	Photographic Publication.
D 8	Betts, E. & A. Wilmington, Del.	Radial Drill.
F 6	Blaisdell, James H. . Philad'a.	Wood Working Machinery.
B 8	Bower, Henry	Chemical Preparations.
F 11	Boyd, G.	Aroma Coffee Roaster.
B 11	Boyer, W. L. Bro.	Agricultural Implements.
A 10	Boyer, L. S. & Co.	Coals.
A 1	Boughton, J. W.	Wood Carpet and Parquet Floor.
B 9	Botthoff, Constantine	Transmutation Fluid and Hair Dye.
B 10	Billman, Charles W.	Sarsaparilla Mead.
C 3	Birge & Berg,	Artificial Flowers and Millinery.
B 10	Bird, John	Press for Moulding Glassware.
B 8	Bitanelly & Co.	Products of Caucasus, Russia.
C 3	Burwell, Wm., & Bro.	Carriage Mountings.
G 9	Blatchley, Charles C.	Cucumber Wood Pump.
A 5	Boland, Fred.	Looking Glass and Picture Frames.
E 10	Brown & Carver,	Paper Cutting Machines.
D 3	Brainerd, Armstrong & Co.	Spool Silk and Cotton.
A 7	Broadbent & Phillips,	Photographs, large size.
F 11	Bridesburg Man. Co.	Looms.
A 4	Bromley, John, & Son,	Carpets.
F 8	Brown, Edward.	Pyrometers and Indicators.
G 9	Brown, Charles H.	Selden direct acting Steam Pump.
D 2	Brooks, William	Millinery, Hats, Bonnets, etc.
E 9	Bullock Print'g Press Co.	Printing Press.
B 9	Bullock & Crenshaw,	Pharmaceutical Preparations.
E 11	Butterworth & Son,	Dyeing Machine.
E 1	Burnham, Charles	Transportation Cans, Demijohns, etc.
E 1	Burnham, William	Crucible Steel Locomotive Tyre, etc.
B 3	Carpenter & Latimer,	Keystone Dress Shirts.
G 3	Carriek, D. & Co.	Crackers, Cakes and Biscuit.
A 6	Carrington, De Zouch & Co.	Window Curtains and Furniture.
D 8	Caldwell, James E. & Co.	Silver Ware, Jewelry, etc.
B 7	Campbell, Samuel, & Co.	Cologne Waters.
C 2	Campbell, S. P. & Co.	Children's Carriages.
C 11	Chipman, Geo. W. & Co. Boston, Mass.	Carpet Linings and Stair Rods.
E 8	Chapman Valve Man. Co.	Gas, Water and Steam Valves.
A 7	Chillman, P. Edward, & Co. Philad'a.	Photographs.

F 9	Chase, Pliny E. Newark, N. Jersey.	Foot Lathes.
D 10	Cohen, Charles J. . . Philad'a.	Envelope Machine.
F 11	Cohen, Robert L. " "	Gas Machine.
A 5	Coates, Wm. Bailey " "	Folding Lounges.
D 1	Conrad & Murry, " "	Anti-Friction Metal.
C 2	Childs, George K. " "	One-Man Wagon.
E 9	Chambers, Bro. & Co. " "	Book Folding Machine.
E 9	Chambers, Cyrus, Jr. " "	Gold Miniature Engine.
G 9	Conde, C. A. " "	Steam Pumps.
C 3	Cook & Brother, " "	Hosiery Goods.
C 11	Coyle, Hugh " "	Lawn Tent, Pat. Cot Table, etc.
F 11	Cooper, Jones & Cadbury, " "	Plumbers' Supplies.
D 3	Cornelius & Sons, " "	Gas Fixtures and Lamps.
A 5	Cooper, Joseph W. " "	Fancy Cabinet Ware.
C 2	Collings Brothers, " "	Carriages, large and small.
B 3	Clayton, W. L. " "	Fine Shirts, old and new style.
A 1	Clark, C. W. " "	Window Shades, Cloth and Fixtures.
C 9	Cornish, Thos. E. " "	Burglar Alarm.
G 9	Cramp & Son, " "	Pumps.
F 7	Cresson, George V. " "	Shafting, Hangers and Pulleys.
G 9	Connery, James W. " "	Boiler.
C 9	Coane Brothers, Westfield, Mass.	Paper Belting, Paper Blankets, etc.
G 7	Crew, Emmor, Opeliska, Ala.	Working Model of Railway.
B 7	Cushman, Cyrus S. . Philad'a.	Sewing Machine Attachments.
F 8	Cutlan Shoe Sew. M. Co. " "	Sewing Machine.
G 3	Davis & Foulke, " "	American Road Steamer.
C 6	Davis, O. F. " "	Sewing Machine.
A 9	Deury & Melliush, " "	Plaster Ornaments.
G 7	Diamond Drill Co., Pottsville.	Diamond Drill.
E 11	Dienalt & Eisenhardt, Philad'a.	Bobbin Winders and Loom.
G 2	Dixon, Thos. S. & Sons. " "	Grates, Gas Logs, etc.
D 1	Diston, Henry & Sons, " "	Saws and Tools.
E 1	Doble, Budd, " "	Horse Shoes.
F 9	Dodge, Theo. A. Boston, Mass.	Grind'g Machine for Wet Substances
A 10	Dreer, Smith & Dreer, Philada'.	Gas Sunlight Apparatus.
C 10	Dreka, Louis, " "	Samples Engraving Illuminating,
C 3	Drown, Wm. A. & Co. " "	Umbrellas.
F 4	Duryea, Wm. New York City.	Starch, Maizena and Corn Starch.
C 10	Dunham, J. K. Philad'a.	Glassware.
D 6	Dyott, M. B. & Son, " "	Chandelier Goods.
A 6	Earle, James S. & Son, " "	Mirrors, Picture Frames, etc.
F 2	Eckfeldt & Richie, " "	Oak Leather for Hose and Belting.
B 8	Elkinton, J. S. & T. " "	Silicate of Soda and Soap.
B 6	Ewing, D. S. " "	Sewing Machines.
G 7	Excelsior Brick & Stone Co " "	Improved Brick Press.
E 2	Fairbank & Ewing, " "	Hay or Coal Scales.

C 11	Farson, E. S.	Philad'a.	Refrigerators, etc.
A 4	Faser, Christian	"	Mirrors.
D 3	Farr Alpaca Co.	Holyoke, Mass.	Alpaca Lustres and Brilliantines.
G 4	Farley, Robert H. . .	Philad'a.	Champion Steam Washer.
F 10	Ferrell & Jones	"	Tank and Boiler Feed Pumps.
E 7	Ferris & Miles,	"	Machinists' Tools.
B 6	Felt, A. B. & Co.	"	Vertical Feed Sewing Machine.
F 3	Fell, C. J. & Bro.	"	Spices and Mustard.
D 1	Field & Hardie	"	Hardware.
E 11	Fiss, Banes, Erben & Co.	"	Worsted Yarn.
C 6	Florence Sewing M. Co.	"	Sewing Machines.
C 5	Florence Sewing M. Co.,	"	Skates.
D 10	Fleisher, S. B. & M.	"	Braiding Machines.
G 5	Forsyth, S. C. & Co.	Manchesteer, N. H.	Palmer Power Spring Hammer
B 2	Fulton, Walker & Co.	Philadelphia.	Wagons, etc.
G 4	Fuller, Warren & Co.	Troy, New York.	Heaters, Ranges and Stoves.
F 2	Fuguet, Stephen & Sons,	Philadelphia.	Key West Havana Segars.
C 10	Galvano Faradic Man'fg Co.	New York.	Electrical Instruments.
B 1	Garner, N. & Sons,	Philad'a.	Wagons.
B 1	Gardner, Wm. D.	"	Carriages.
E 11	Gavit, Nelson	"	Pat. Cone Pulley Paper Cutter, etc.
F 3	Gefrorer, C.	"	Plumbers Supplies.
C 8	Gifford, J. E. & Co.	"	Birmingham and Lava Work.
B 11	Gill, B. & Sons,	"	Thresher and Cleaner.
G 8	Gilman & Farren,	"	Steam Boiler.
D 5	Godfrey, John	"	Hospital Bed Elevator.
A 7	Gossin, F.	"	Terra Cotta Statuary, Vases, etc.
B 11	Graham, Emlen & Passmore,	Philadelphia.	Agricultural Implements.
C 11	Gravenstine, John . .	Philad'a.	Refrigerator and Cooler.
A 9	Graff Brothers,	"	Lithographic Press.
A 5	Gratznowskey, Wm.	"	Spring and Hair Mattress.
B 10	Green, Robert M.	"	Soda Water Apparatus.
C 6	Grover & Baker Sewing Machine Co.	Philad'a.	Sewing Machine, etc.
E 9	Grimshaw, R.	Philad'a.	Sewed Canvas and Rubber Belting.
A 8	Gutekunst, F.	"	Photographs.
G 11	Hall, C. Henry & Co.	"	Pulsometer Steam Pump.
D 2	Hall, L. C. Jr. & Co.	"	Machine Twist.
A 4	Hale, Kilburn & Co.	"	Looking Glass and Picture Frames.
B 7	Hanee, Bros. & White,	"	Dry Milk and Chem. Preparations.
B 3	Hackenburg, Aub. & Co.	"	Machine and Sewing Silks.
C 8	Harden, John H.	"	Drawing Board Trestles.
G 7	Harrison Boiler Works,	"	Boiler.
F 10	Harrison, W. H.	"	Double Acting Pumps.
G 2	Harrison, W. H. & Bro.	"	Warm Air Furnaces.
B 8	Harrison Bros. & Co.	"	Paints, Colors and Chemicals.
E 6	Harrington, Edw & Son.	"	Iron Working Machinery.

G 3	Hayes, J. P. & Bro., Philad'a.	Ranges, Gas and Fluid Stoves.
G 2	Hayes, Coulter & Co.	Heaters and Ranges.
F 2	Hanson & Kirk,	Cemetery Lot Enclosures.
B 8	Hastings & Co.	Gold and Silver Leaf and Gold Foil.
A 5	Heacock, William,	Furniture, etc.
A 4	Heacock, William, . .	Bedroom Furniture & Parlor Cabinet
A 9	Heath, Matilda	Marble Work.
A 6	Henkle, G. J. & J.	Chamber Furniture.
F 2	Herder, L. & Son,	Shears and Scissors.
C 6	Henry, Frank	Goodrich S. Machine Attachment.
C 9	Heller & Brightly,	Surveying and Engineering Instr.
G 6	Higinbothom, Joseph	Shafting, Coupling and S. Valve.
E 1	Hopkins & Dickenson,	Revolving Board for Hardware.
A 2	Howell & Bros.	Paper Hangings.
F 8	Howe Machine Co.,	Machines run by Steam.
B 9	Hover, Joseph E.	Writing Inks.
B 10	Houghton, E. F. & Co.	Cosmoline, for Medical Purposes.
B 7	Hurst, John C. & Sons,	Burdicks Polish Blacking.
A 8	Janentzky & Co.	Water Colors.
F 8	Jones, Alonzo A.	Machinists Supplies.
D 3	Jones, Wm. E.	Dress Shirts in Case.
A 2	Johnston, Edwin J.	Window Shades, etc.
C 10	Kerr, James K. & Bro.	China and Glassware.
B 9	Kerr, Norman M., & Co.	Paper Boxes.
B 7	Keasby, Mattison & Rutter,	Effervescent Preparations.
B 3	Keyser, Mrs. E.	Children's Clothing.
G 6	Keystone Port'lc Forge Co.	Portable Forge and Blowers.
C 1	Kimes, J. B., & Co.	Slate Mantels and Slate Work.
A 4	Kilburn & Gates,	Cottage Chamber Furniture.
C 3	Klein, Chas. C.	Eccentric Piston Engine.
A 3	Knight, Reeve L. & Son,	Carpeting.
A 4	Knell, George	Sofa Bed, Reclining Chair, etc.
F 1	Knickerbocker Ice Co.	Ice Tools.
G 9	Knowles' Steam Pump Co.	Steam Pump in motion.
B 9	Kohler, J. G.	Book Binding.
F 10	Koningmacher, A.	Millstones.
A 7	Kretchman, E. A.	Model of Public Buildings.
F 9	Kreider, Zendgrof & Co.	Grain Mill.
B 8	Kurlbaum & Co.	Chemicals.
A 10	Lantenbach, A.	Fretwork.
B 3	Ladies' Depository,	Articles of Needlework.
F 3	Lagomarcino & Guneo,	Macaroni, Vermicelli, etc.
F 5	Lattimer, D. J.	Planing Machine Duster.
F 7	Lehigh Valley Emery Wheel Co.	Weissport, Pa. Emery Wheel, etc.
B 1	Lengert, George & Son, Philad'a.	Express Wagon.
E 8	Le Van, W. Howard,	Grate Bars & Fire Regulators.

G 2	Leibrandt & McDowell Stove Co.	Phila.	Stoves, Heaters and Ranges.
C 3	Linderman, B., & Co.	Philad'a.	Ladies Underwear.
C 3	Little, Benj. R.	"	Fine Dress Shirts.
B 3	Lippincott, Chas. & Co.	"	Soda Water Apparatus.
B 6	Lipman Manufac'g Co.	"	Patent Eyelet Machine.
A 9	Longacre & Co.	"	Wood Engravings and Machine.
A 8	Louderback, James W.	"	Wood Engravings.
G 11	Lovegrove & Co.	"	Atlas Steam Pump.
G 6	Lovegrove & Co.	"	Vertical and Horizontal Engines.
A 5	Lowe, A., & Co.	"	2 Large Mirrors.
B 8	Lucas, John, & Co.	"	Paints and Colors.
C 9	Mann, William,	"	Blank Books, etc.
F 3	Machette, Jr., E. V.	"	Self-raising Flour and Buckwheat.
D 2	Marter & Co.	"	Ladies' and Misses' Garments.
D 11	Marshall, Bro. & Co.	"	Roofing Sheets.
B 9	Mason & Co.	"	Engraving and Fine Stationery.
A 5	McCracken, Samuel	"	Star Centre Table.
F 7	McChesney, Reuben,	"	Fancy Arm Scroll Saw.
E 1	McCaffrey & Bro.	"	Files and Rasps.
B 10	McConn, John	"	Steam Radiator.
C 1	McLear & Kendall,	"	Carriages.
C 6	McLean & Benner Machine Co.	Philadelphia.	Sewing Machine.
G 5	McCoy & Roberts,	Philad'a.	Cooking Ranges and Furnaces.
G 5	McBride, Thomas,	"	Hydraulic Car Brake.
B 9	McKeeson & Robbins,	N. Y City.	Pharmaceutical Preparations.
F 1	Mecutcheon, John F.	Philad'a.	Patent Eccentric Hook.
F 6	Mellor & Oram,	"	Wood Working Machine.
C 7	Menamin, Robt. S.	"	Printers' Chases, etc.
D 11	Mellick, Peter B.	"	Terra Cotta Ware.
G 4	Mershon, Daniel, Sons,	"	Russian Heaters, Portable Heaters.
A 8	Metcalf, Edwin	"	Pen Picture.
G 7	Miles, Jacob F. & Co.	"	Keystone Injectors.
B 9	Miller & Rittenhouse,	"	Chemical and Phar. Manufactures.
E 1	Miller, Barr & Parkin,	"	Cast Steel.
G 6	Miller, Samuel P. & Son,	"	Brick Press.
F 10	Mitchell, J. E.	"	Grind Stones, Fr. Burr Millstones.
G 3	Morris & Haines,	"	Range, with Circulating Boiler.
F 7	Morris, Henry G.	"	Centrifugals for Sugar, with Engine.
E 2	Moore & Mixsell,	"	Assortment of Scales.
D 11	Mohler, Richard,	"	Fourdrinier Wire Cloth.
F 9	Mundell, John, & Co.	"	Machine for Sewing on Boot Soles.
G 6	Myers, George	"	Bath and Range Boiler.
A 1	Nagle, Cook & Ewing,	"	Paper Hangings.
F 8	Naylor, Jacob,	"	Steam Engines and Valves.
F 8	Naylor, Jacob,	"	Vertical Engine and Cylinder.
A 7	Newell, Robert, & Sons,	"	Photos. of Mdze., Country Seats, etc.

G 5	Newkumet, A.	Philad'a.	Crucible Machines.
D 1	Nichols, Pickering & Co. "		Spiral and Volute Springs.
F 7	Northampton Emery Wheel Co. Mass.		Emery Wheels and Machines.
D 11	New York Sand Blast Co.		Glass Pictures by Sand Blast.
E 1	Oberlin, Smith, Bros.	Bridgeton.	Can Makers.
C 11	O'Hara, Charles M.	Philad'a.	Comfortable Chair, for ordinary use.
A 1	Oil Painted Wall Paper Man. Co.	Bethlehem, Pa.	Wall Papers, Frescoes
A 8	Osgood, Jas., & Co.	Boston, Mass.	Heliotypes, in Frames and Portfolios
C 11	Packer, Charles W.,	Philad'a.	Ice Cream Freezers, 13 samples.
G 7	Parham, Charles	"	Machine Tools.
C 2	Patterson, Thos. B.	"	Adams Patent Hand Truck.
A 8	Penn Salt Manuf. Co.	"	Chemical Products.
D 1	Phila. Architectural Co.	"	Architectural Iron Work.
C 2	Phila. Axle Works,	"	Carriage and Wagon Axles.
G 5	Phila. City Pass. R.W. Co.	"	Passenger Railway Car.
E 6	Phila. Fire Extinguisher Co.	"	H. & L. Truck, and Extinguisher.
C 11	Phila. Galvanizing Co.	"	Galvanized Iron.
F 10	Phila. Hydraulic Works,	"	Steam Pumps, Samples Cast Steel, etc
D 6	Phillips, William J.	"	Tel. Instrument, and Fire Alarm.
D 7	Pierce, I. Newton	"	Pierce's Patent Folding School Desk.
D 11	Poole, J. Morton, & Co.	Wilmington, Del.	Machine Calender.
C 11	Pohl & Rosenstein,	Philad'a.	Head Spouting.
C 9	Porter & Coates,	"	Books.
F 9	Potter & Hoffman,	"	Machinery and Supplies.
G 10	Potter & Perkins,	"	Fire Hydrant Connections.
C 9	Potter, John E. & Co.	"	Complete Bible Encyclopedia, etc.
A 3	Potter, Thos., Sons & Co.	"	Oil Cloths.
A 9	Potsdamer & Co.	"	Lithographic Work.
F 5	Power, Tainter & Co.	"	Planing and Flooring Machine.
B 9	Powers & Weightman,	"	Chemicals.
B 5	Prestien & Berwind,	"	Pianos.
E 11	Pusey, Jones & Co.	Wilmington, Del.	Paper Machinery, etc.
C 8	Queen, Jas. W., & Co.,	Philad'a.	Math., Philos. & Optical Instruments.
B 9	Rawlins Metallic Paint Co.,	Wyoming.	Metallic Paint.
F 2	Rankin, Andrew,	Philadelphia.	Bronzed and Chased Work.
F 1	Reading Hardware Co.	"	Japanned Dark Bronze Work, etc.
A 10	Repetti, Joseph	"	Wax Figures.
A 7	Reimer, B. F.	"	Picture Frames and Looking Glasses
G 3	Reynolds, J. & Sons,	"	Furnaces and Ranges.
F 11	Rex & Bockius,	"	Printing Press.
D 11	Remmey, Richard C.	"	Fire Brick Tile and Stone Tile.
C 2	Ries, Anton	"	Silver Mounted Harness.
G 9	Richie, E. L.	"	Bilge and Force Pump.
C 11	Rice, J. D.	"	Lightning Rods and Wind Vanes.
F 11	Rhoads, N. S.	"	Windmill.
G 9	Rhoads, William G.	"	Pumps.

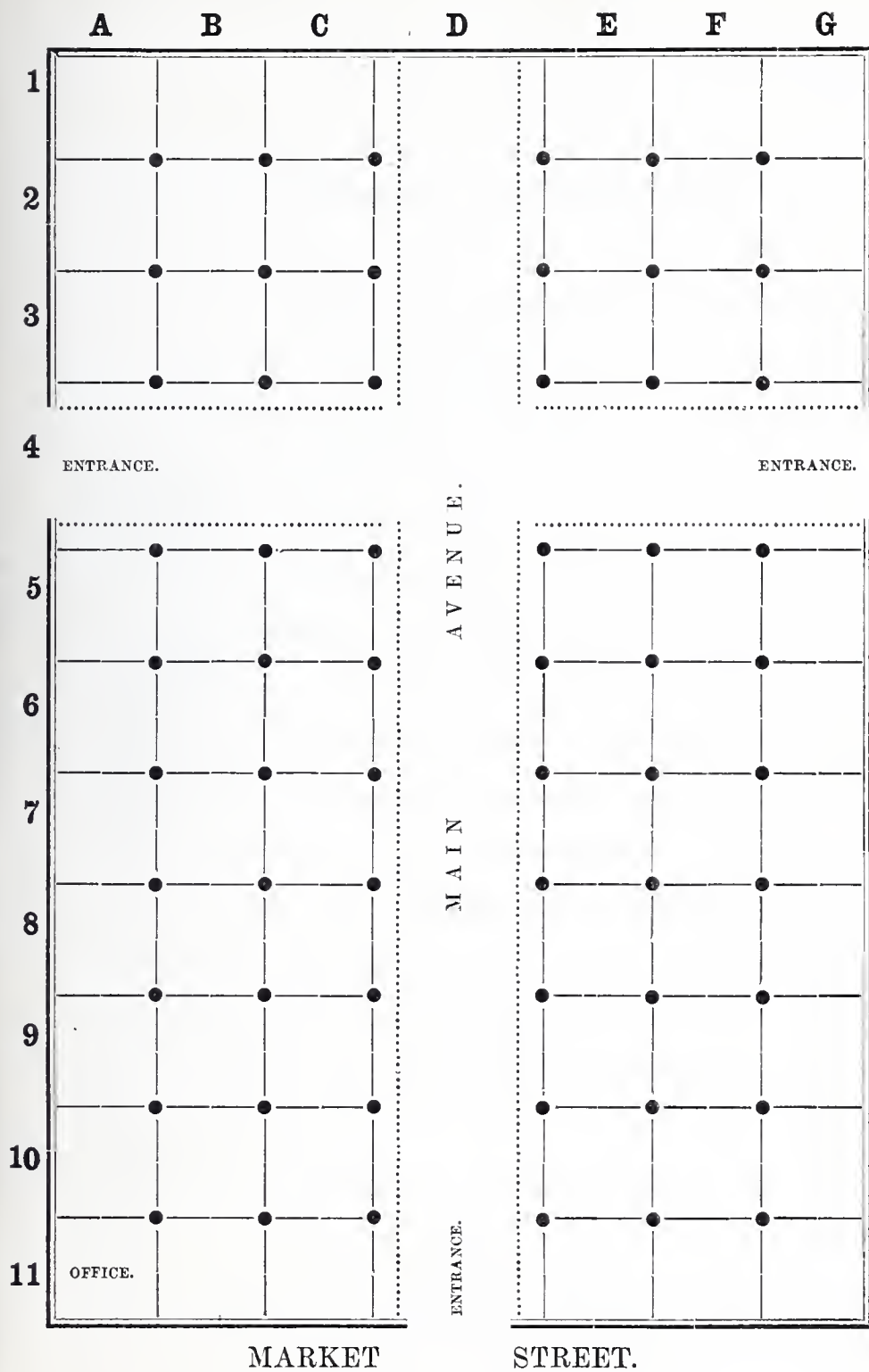
C 2	Ridgeway & Oliphant, Philad'a.	Gloves and Gauntlets.
D 5	Rice, D. E.	Monitor Sewing Machine.
F 4	Richards, Loudon & Kelly	Wood Working Machinery.
F 8	Richards & Pike,	Barras' Elliptic Steam Trap.
E 3	Riehle Bros.	Scales and Testing Machine.
B 2	Rogers, Wm. D. & Co.	Carriages.
F 9	Root, P. H. & T. M.	Rotary Blower or Exhaust Fan.
F 11	Rorer, Thomas J.	Improved Union Belting.
F 1	Rose, Wm. & Bros.	Trowels, and Saddlers' Knives, etc.
B 8	Rosengarten & Sons,	Case of Chemicals.
C 3	Rumpp, C. F.	Fancy Leather Goods.
E 8	Rue Manufacturing Co.	Little Giant Injector.
F 2	Russell & Erwin Man. Co.	Bronze Builders' Hardware.
C 3	Sachse, F. & Son,	Fine Dress Shirts.
A 8	Sartain, Samuel	Engravings on Steel.
B 4	Schoenhut, Albert	Metallic Toy Piano, etc.
A 8	School Design for Women.	Drawings.
A 2	Schopp, Philip J. Louisville, Ky.	Pneumatic Screen Ventilator.
A 9	Scheible, Wm. F. . . Philad'a.	Flags and Decorations.
F 2	Schofield, Peter,	Gauge Cock.
B 4	Schomaker Piano Mfg. Co.	Upright and Square Pianos.
F 9	Searfoss, Amos H. Newark, N. J.	Vertical Portable Grinding Machine
F 2	Sellers Brothers, . . . Philad'a.	Wire Goods.
E 4	Sellers, Wm. & Co.	Machine Tools.
C 3	Shoemaker, M. & Co.	Children's Clothing.
B 3	Shedaker & Lindsay.	Miniature Shirt Factory.
F 1	Shannon, J. B.	Revolving Sample Board Hardware
B 9	Sharpless, J. M. & Co.	Dye Stuffs, Dyed Cotton, etc.
C 11	Sherwood, Amanda S.,	Fountain Griddle and Greaser.
E 1	Shipley, Howard M.	Pocket Cutlery.
F 1	Shipley, A. B. & Co.	Fishing Tackle and Sundries.
C 2	Shill, Harry J.	Children's Carriages.
F 11	Shive Governor Co. Bethlehem.	Steam Engine Governor.
C 11	Shock & Kimball, . . Philad'a.	Carbon Block Filters and Coolers.
C 10	Shriver, T. & Co. New York.	Copying Presses.
B 6	Singer Manufacturing Co. Phila.	Sewing Machines.
F 10	Slocomb, W. H. & S. H. Philada.	Meat Cutter, Fruit Cleaner, etc.
B 7	Smith, Wm. M. Philada.	Device for Driving Sewing Mach. by Steam.
C 7	Smith, J. L. Philad'a.	Map Case with Maps.
G 5	Smith, Charles H.	Baxter Engine.
G 11	Smith, R. D. O. Washington, D.C.	Odorless Water Closet, etc.
G 5	Snyder, Henry & Co. Philad'a.	Shapley Steam Engine.
G 1	Spaulding, I. D. Boston, Mass.	Models for Hatch Cover Attachments
G 3	Spear, James & Co. Philad'a.	Furnaces, Heaters and Stoves.
C 9	Spellier, Louis H. Doylestown.	Clock, etc.
C 4	Standbridge Bros. . . Philad'a.	Chapel Organ.

G 7	Steam Generator Co. Philad'a.	Boiler.
A 1	Steinmetz, Adam, "	Mantels and Monuments.
A 10	Steel, Robert, "	Fancy Written Show Cards.
F 10	Stewart, David, "	Cracker Machine.
F 9	Stewart, Marks, Ralph & Co. Ph	Packing and Weighing Machines.
G 5	Stout & Marembach, Philad'a.	Double Oven Range Boiler, etc.
G 3	Stuart, Peterson & Co. "	Enameled and Tinned Hollow Ware.
B 9	Tage, Charles "	Ladies Dress Elevator.
F 7	The Tanite Co. Stroudsburg, Pa.	Emery Wheel, Plainer, etc.
B 8	Taylor, C. R. & Co. Philad'a.	Toilet Soaps and Perfumery.
F 1	Taylor, N. & G. & Co. "	Tin Plate.
C 5	Taylor & Smith, "	Color Printing, Lithographing, etc.
F 9	Teal, Chas. Albert "	Hair Picking and Cleaning Machine
C 9	Thompson, David, Newark, N. J.	Carbons for Galvanic Battery.
D 3	Thompson, E. O. . . . Philad'a.	Pantaloons and other Garments.
D 7	Thorne, DeHaven & Co. "	Machinists Tools.
E 10	Times Printing House. "	Franklin Printing Press.
F 4	Travis, J. L. "	Water Closet.
E 4	Troemner, H. "	Scales. Weights and Mills.
F 7	Trump Bros., Wilmington, Del.	Fleetwood Scroll Saw.
F 9	Tully, John W. Philad'a.	Patent Paint Filling.
E 9	Union Iron Company, Philad'a.	Beams 60 and 50 feet long.
B 7	Upham, Samuel C. "	Florida Waters.
E 7	VanHaagen, C. & Co. "	Machine Tools.
B 8	Vogelback, H. A. "	American Perfumery.
F 2	Walker, M. & Sons. "	Wrt Iron Railings and Wire Work.
F 9	Walker Bros. & Co. "	Farm Mill.
C 3	Wanamaker & Brown, Philad'a.	Clothing.
B 8	Warner, Wm. R. & Co. "	Sugar Coated Pills.
E 1	Washburn & Moen Manufacturing Co. N. Y.	Manufactured Wire.
F 6	Watson, Andrew. . . Philad'a.	Upright Steam Engine.
C 2	Weaver & Lyle. "	No-Top Wagon.
F 2	Weaver & Pennock. "	Marble & Walnut Plumbing Fixtures
C 6	Weed Sewing Machine Co. "	Sewing Machines.
G 7	Weicke, Edward. "	Steam Boiler.
A 5	Wells, Hope & Co. "	Patent Advertising Signs.
G 7	Wharton R. R. Switch Co. "	Railroad Safety Switch.
A 9	Wharton, Joseph, Camden, N. J.	Ores and Products of Nickel, etc.
F 9	Wheeler & Wilson Manuf. Co., Bridgeport, Conn.	Sewing Machines.
E 1	White & Samson. . . Philad'a.	Cutlery.
C 9	White, S. S. "	Dental Instruments and Material.
F 9	Wilbraham, T., & Bro. "	Engine and Presser Blowers.
C 11	Wiler, William "	Stair Rods. Step Plates, etc.
A 1	Williams, Charles. Philadelphia.	Slate Mantels.
F 8	Wilson Sewing Machine Co., Philadelphia.	Sewing Machine.
B 1	Wilson & Miller, . . . Philada.	Slate Mantel.

B 9	Wilson, William M.	Philad'a.	Florida Water.
E 8	Wilson (Shuttle) Sewing Machine Co.,	Cleveland, O.	Sewing Machine.
A 2	Wilson & Fenimore,	Philad'a.	Paper Hangings.
C 11	William L. Wilson,	"	Terra Cotta Ware.
E 10	Wood, Thomas	"	Power Looms.
F 2	Wood, R. D. & Co.	"	Fire Hydrant.
D 2	Wood, David	"	Ladies' and Infants' Clothing.
F 9	Wolter, George C.	"	Wet Skin Sewing Machine.
D 2	Womrath, F. K.	"	Ladies' Furs.
F 1	Wright, James C. Berks Co.	Pa.	Cast Iron Chimney Top.
F 3	Wright, Mrs. Joshua,	Philad'a.	Mince Meat.
F 8	Wright & Smith,	"	Variable Speed Shafting.
C 8	Wyeth, John, & Bro.	"	Compressed Pills, etc.
E 1	Yale Lock Co.,	Stamford, Conn.	Locks, and Bronze Hardware.
B 10	Zell, T. Elwood,	Phildelphia.	Samples of Books.
C 10	Zentmayer, Joseph	"	Microscopic Apparatus.

Plan Showing the Location of the Sections.

THIRTEENTH STREET.



Classified List of Exhibits.

I. Agricultural Implements.

- 17 Aquariums. John M. Hess, Philadelphia.
- 13 Cider and Wine Press. C. B. Rogers, Philadelphia.
- 12 Farm Cultivator. C. B. Rogers, “
- 4 Feed Cutter. W. L. Boyer & Bro. “
- 16 Fern Cases. John M. Hess, “
- 11 Fertilizing and Seeding Roller. J. B. Conkling, Philadelphia.
- 18 Flower Pots, Vases. John M. Hess, “
- 15 Hanging Baskets. John M. Hess, “
- 1 Lawn Mower, Centennial. W. L. Boyer & Bro. “
- 10 Lawn Mower, Continental. John B. Cot, “
- 8 Lawn Mower, Philadelphia. Graham, Emlen & Passmore, Philadelphia.
- 3 Mowing Machine, Wood's. W. L. Boyer & Bro. “
- 2 Railway Horse-Power, Union. W. L. Boyer & Bro. “
- 9 Screw Mower. Screw Mower and Reaper Co. Phillipsburg, N. J.
- 14. Seeds. C. B. Rogers, Philadelphia.
- 6 Thresher and Cleaner. B. Gill & Sons. Trenton, N. J.
- 7 Thresher, Rye. B. Gill & Sons, “
- 5 Worm Trap. F. Bailey, Philadelphia.

II. Agricultural Productions, including all articles of Food.

- 1 Beet Sugar. H. W. Bartol, Philadelphia.
- 15 Boiler Tubes. W. C. Allison & Sons, Philadelphia.
- 16 Bolts, Nuts and Washers. W. C. Allison & Sons, Philadelphia.
- 13 Confectionery, Ornamental. E. M. Dexter, “
- 7 Crackers, Cakes and Biscuit. D. Carrick & Co. “
- 12 Crackers, Cakes, etc. T. Wilson & Co. “
- 7 Farina. H. C. Kellogg & Co. “
- 3 Flour, Self-Raising. E. V. Machette, Jr. “
- 11 Flour, Self-Raising. H. C. Kellogg & Co. “
- 4 Macaroni, Vermicelli, etc. Lagomarsino & Guneo, “
- 5 Mince Meat. Mrs. Joshua Wright, “
- 6 Mince Meat, etc. Atmore & Son, “
- 8 Spice and Mustard. C. J. Fell & Bro. “
- 2 Starch, Maizena and Corn Starch. William Duryea, New York.
- 10 Wheaten Grits. H. C. Kellogg & Co. Philadelphia.

III. Arms and Military Goods.

- 1 Military and Society Regalias, Church and Theatrical Goods, (in Glass Cases.) Horstmann Bros. & Co. Philadelphia.

IV. Books, Book-Binding, Stationery, &c.

- 8 Bible Encyclopedia, Complete. John E. Potter & Co., Philadelphia.
- 16 Blank Books, in glass case. Wm. F. Murphy's Sons, "
- 12 Blank Books. William Mann, "
- 15 Books, Display of. Porter & Coates, "
- 20 Books, as Books of Reference. T. Ellwood Zell, "
- 11 Book Binding, Specimens of. Ig. Kohler, "
- 2 Chemical Writing Fluid. Joseph E. Hoover, "
- 4 Copying Presses. T. Shriver & Co., New York.
- 9 Family Bible. John E. Potter & Co., Philadelphia.
- 6 Ledger Paper, Paper Batting, Paper Blanket. Crane Bros., Westfield, Mass.
- 5 Paper and Blank Books, Hoover's Carbonized. Lipman Man. Co., Philada.
- 3 Paper Boxes. N. M. Kerr & Co., Philadelphia.
- 7 Paper Trunk and Wagon Body. Crane Bros., Westfield, Mass.
- 14 Reed's Historical Tree of the Church. John Hasson, Philadelphia.
- 13 Steel Pens. Esterbrook Steel Pen Company, Camden, N. J.
- 1 Writing Inks. Joseph E. Hoover, Philadelphia.

V. Boots and Shoes.

- 2 Boots and Shoes, Fine, in glass case. Wm. F. Bartlett, Philadelphia.
- 3 Boots and Shoes, Fine, in case. C. Benkert & Son, "
- 4 Boots and Shoes, Water-proof Leather. Porous Water-proofing Co.
- 5 Boot Trees, Indexical Revolving. Thomas R. Evans, Philadelphia.
- 1 Gaiter, Evans' American. Thomas R. Evans, "
- 6 Shoe Trees, Stretchers and Lengtheners. Thos. R. Evans, "

VI. Cabinet Ware and Upholstery.

- 38 Bed Springs, Flinn's Patent Self-fastening. John Flinn, Philadelphia.
- 8 Bedstead, Chairs, etc., Patent. Hale, Kilburn & Co. "
- 36 Bedstead, Iron, Centennial. Hugh B. Coyle, "
- 22 Bedstead, Folding Parlor. Hale, Kilburn & Co. "
- 20 Billiard Table. Taylor and Estephe, "
- 19 Billiard Table. H. W. Collender, New York.
- 34 Cabinet Ware, Fancy, Brackets, etc. R. W. P. Goff.
- 13 Cabinet Ware, Fancy. Jos. W. Cooper, Philadelphia.
- 31 Chair and Lounge, combined. George Knell, "
- 16 Chairs, Comfortable, for ordinary use. Charles M. O'Hara, Philadelphia.
- 21 Chair Seats. Hale, Kilburn & Co. "
- 25 Cottage Chamber Furniture. Kilburn & Gates, "
- 10 Furniture, Bedroom and Parlor Cabinet. Wm. Heacock, "

27 Furniture, Chamber.	G. J. & J. Henkle,	Philadelphia.
14 Furniture, etc.	William Heacock,	"
35 Furniture.	Allen Bros.	"
39 Furniture, Bedroom set.	George C. Mangan & Son.	"
42 Furniture, Parlor.	Samuel B. Register,	"
43 Furniture, Parlor, and Barbers' Chairs.	John McKinley,	"
29 Invalid Chair and Bed, combined.	George Knell,	"
1 Lounge, United States Convertible Folding.	W. Bailey Coates.	"
7 Looking Glass and Picture Frames.	Hale, Kilburn & Co.	"
17 Looking Glass and Picture Frames.	Frederick Boland,	"
18 Looking Glass and Picture Frames, Ornamented.	B. F. Reimer,	"
2 Mattress, Spring and Hair.	Wm. Gratznowsky,	"
6 Mirrors, in Frames.	Christian Faser,	"
12 Mirrors and Picture Frames.	J. S. Earle & Son,	"
24 Mirror Frames, Chamelecon.	Hale, Kilburn & Co.	"
26 Mirrors, Pictures and Paintings.	A. Lowe & Co.	"
32 Photographic Chair.	George Knell.	"
30 Reclining Chair.	George Knell.	"
15 Settee, Improved Reversible.	J. A. Bancroft & Co.	"
41 Spring, Cobb's Patent, for Beds, Chairs, etc.	Fisher & Pratt,	"
3 Star Centre Table, inlaid, 34,800 pieces.	Samuel McCracken,	"
37 Star Centre Table.	Samuel McCracken,	"
5 Show Case.	Walter & Stoelt,	"
44 Show Case, Convex.	James Irous,	"
28 Sofa Bed.	George Knell.	"
33 Spool Silk Cabinet, in sections.	Brainerd, Armstrong & Co.	"
40 Veneers, Foreign and Domestic.	A. L. Rapp & Son.	"
11 Window Shades, and balanced Spring Roller.	Ed. S. Johnston,	"
4 Window Shades, and Shade Cloth Fixtures.	C. W. Clark,	"
9 Window Curtains and Furniture.	Carrington, De Zouche & Co.	"
22 Walnut Mats for Picture Frames.	Hale, Kilburn & Co.	"

VII. Carpets, Oil Cloths, and Floor Coverings.

8 Carpets, Ingrain and Damask Venetian.	Bromley & Sons, Philadelphia.
2 Carpetings.	Reeves L. Knight & Son.
5 Carpetings.	Bromley Bros.
7 Carpetings.	Thomas Depuy.
4 Carpet Lining and Stair Pads.	Geo. W. Chipman & Co., Boston, Mass.
3 Oil Cloths.	Thomas Potter, Sous & Co., Philadelphia.
1 Wood Carpet, and Parquet Floor.	J. W. Boughton, Philadelphia.
6 Window Shades, Improved Rustic.	Edwin Louderback, "

VIII. China, Glass and Porcelain, etc.

3 China, Decorated.	James S. Kerr & Bro., Philadelphia.
4 Engraving on Glass.	James K. Kerr & Bro. "
5 Engraving on Glass.	James K. Kerr & Bro. "

2	Glassware. Druggists'.	William Halzer,	Philadelphia.
6	Glassware	J. K. Dunham,	"
7	Glassware.	Whitall, Tatum & Co.	"
8	Glass.	J. A. Magee,	"
9	Glass Work.	Hale & Manley,	"
10	Glass Labels.	Hale & Manley,	"
12	Glass, Plate.	Ward & Co.,	"
11	Show Jars.	Hale & Manley,	"
1	Vases.	J. E. Jeffords & Co.	"

IX. Coach and Wagon Work and Supplies.

1	Axles, Carriage and Wagon.	Philadelphia Axle Works.
3	Carriages.	William D. Rogers & Co., Philadelphia.
8	Carriages.	McLear & Kendall, "
10	Carriages.	William D. Gardner, "
13	Carriages.	Collings Bros. "
16	Carriages.	James Fleming, "
17	Carriages.	Samuel W. Jacobs & Son, "
5	Carriages, Children's.	S. J. Campbell & Co., Philadelphia.
8	Carriages, Children's.	H. J. Shill, "
23	Carriage Bolts.	Coleman's Nut and Bolt Co. "
7	Carriage Mountings.	Burwell & Bros. "
14	Metallic Hub Wheel.	George W. Eadline, Bustleton.
2	Omnibus and Wagons.	Fulton, Walker & Co., Philadelphia.
25	Springs.	Benezet & Co., Philadelphia.
20	Wagon, Dearborn.	Davy & Hunt, Philadelphia.
21	Wagon, Dump.Seat.	Davy & Hunt, "
18	Wagon, No-top.	Weaver & Lyle, "
11	Wagon, Truck.	George Sargent & Son, Philadelphia.
4	Wagons.	W. Garner & Son, Philadelphia.
6	Wagon.	George K. Childs, "
15	Wagons.	Fulton, Walker & Co. "
12	Wagons, Business.	George Lengert & Son, Philadelphia.
24	Wagons, Business.	P. B. Cunningham & Co., Bethlehem.
17	Wheel Stoek.	John G. Davis & Son.
22	Wheels and Spokes.	Hoopes, Bro. & Darlington, West Chester.

X. Coal and Minerals.

2.	Coal.	L. S. Boyer & Co., Philadelphia.
3.	Corundum.	J. C. Hand, "
1	Ores, and Products of Nickel and Cobalt.	Jos. Wharton, Camden, N. J.

XI. Combs and Brushes.

1	Brushes and Bellows.	George W. Metz & Sons, Philadelphia.
---	----------------------	--------------------------------------

XII. Copper, Brass and Plumbers Work, and Tinware.

- 11 Bath Tub, and Combination Shower Cock. Jas. L. Travis, Philadelphia.
- 13 Brass Work, Steam and Plumbing. Jas. L. Travis, “
- 5 Carbon Block Filters and Coolers. Shock & Kimball, “
- 10 Copper Ware, Plumbers', Assortment of. C. A. Blessing, “
- 1 Corrugated Expanding Water Conductor. Austin & Obdyke, “
- 6 Compression Bib Cocks. Cooper, Jones & Cadbury, “
- 14 Copper and Brass Tubes, Seamless. Merchant & Co. “
- 4 Marble and Walnut Plumbing Fixtures. Weaver & Pennock, “
- 8 Refrigerator and Water-Cooler Combined. John Gravenstine, “
- 15 Sheet Copper, in cases and sheets. Merchant & Co. “
- 9 Sideboard Refrigerator and Water-Cooler. John Gravenstine, “
- 7 Transportation Cans, Box Cans. Charles Burnham & Co. “
- 2 Valve Water Closet. Cooper, Jones & Cadbury, “
- 12 Water Closets, “Ne Plus Ultra.” James L. Travis, “
- 3 Water Closet, Odorless, Urinal, etc. R. D. O. Smith, Washington, D. C.

XIII. Cotton, Woolen and Silk Goods.

- 5 Bed Ticking and Shirting. D. Trainer & Sons, Philadelphia.
- 1 Silks, Machine and Sewing. Aub, Hackenbush & Co., Philadelphia.
- 4 Quilts and Table Cloths. Wood & Haslam, “
- 2 Worsted Yarn, Gonnappa. Fiss, Baner, Erben & Co. “
- 3 Worsted Yarn. Fiss, Baner, Erben & Co. “

XIV. Dentistry and Surgical Instruments.

- 1 Artificial Teeth, Dental Instruments, etc. S. S. White, Philadelphia.
- 4. Artificial Teeth, with Apparatus. Dr. Charles A. White, “
- 7 Hand Turbine, for driving Dentists' Drills. A. W. Straub, “
- 2 Hospital Bed Elevator, for transferring from ward to ward. J. Godfrey.
- 3 Hospital Ward Dressing Carriage. John Godfrey, Philadelphia.
- 5 Trusses and Bandages. J. B. Seeley, “
- 6 Trusses and other Surgical Bandages B. C. Everett, “

XV. Drugs, Dye Stuffs and Chemicals.

- 3 Centennial Bouquet Perfumes. S. C. Upham, Philadelphia.
- 12 Chemicals. Rosengarten & Sons, “
- 16 Chemicals. Powers & Weightman, “
- 25 Chemicals. Kurtbaum & Co. “
- 1 Chemical Preparations. Hance Bros. & White, “
- 26 Chemical Products. Penn Salt Manufacturing Company, Philadelphia.
- 15 Chemical Stoneware. Richard C. Remmey, “
- 8 Chemical and Pharmaceutical Manufactures. Mellor & Rittenhouse, Phila.
- 23 Cod Liver Oil, etc. John C. Baker & Co., Philadelphia.
- 4 Cologne Water. S. C. Upham, “

- 7 Cologne Water. Samuel Campbell, Philadelphia.
- 20 Compressed Pills, etc. John Wyeth & Bro. "
- 37 Cordial Bitters. Henry A. Chalvin, New York.
- 28 Cosmoline. Houghton & Co., Philadelphia.
- 24 Dye Stuffs and Goods. J. M. Sharpless & Co., Philadelphia.
- 5 Florida Water. S. C. Upham, "
- 27 Florida Water. William M. Wilson, "
- 22 Granular Effervescent Preparations. Keasbey, Mattison & Rutter, Phila.
- 6 Medicinal Fluid Extracts. Samuel Campbell, Philadelphia.
- 9 Percolating Apparatus. Hance Bros. & White, "
- 30 Perfumery. H. A. Vogelbeck, "
- 34 Pharmaceutical Preparations. Jacob Dunton & Co. "
- 21 Pharmaceutical Preparations. McKeeson & Robbins, New York.
- 14 Pharmaceutical Preparations. Bullock & Crenshaw, Philadelphia.
- 31 Phosphate of Zinc, etc. Doerr & Sloan, "
- 32 Pine Apple Vinegar. Hansell & Brother, "
- 19 Prussiate of Potash and Glycerine. Henry Bowers, "
- 35 Shoe Blacking. Boggs & Axford, "
- 11 Silicate of Soda. J. S. & T. Elkinton, "
- 18 Soda Fountain. Robert M. Green, "
- 2 Soda Water Apparatus. Charles Lippincott & Co. "
- 10 Soda Water Apparatus. Robert M. Green, "
- 29 Soda Water, and other Beverages. Theodore A. Dodge, Boston.
- 33 Stove Polish. H. C. Kellogg & Co., Philadelphia.
- 13 Sugar Coated Pills. William R. Warner & Co., Philadelphia.
- 36 Toilet Powders. W. H. Savournin, "
- 17 Water-proofing Process. Alex. C. McKnight, "

XVI. Fine Arts and Photography.

- 1 Artists' Materials. Janentzky & Co., Philadelphia.
- 30 Artists' Color and Brush Stand. S. James, "
- 40 Architectural Water-Color Drawing. B. Linfoot, Philadelphia.
- 9 Bronze and Chased Work. Andrew Rankin, "
- 33 Cartoons in Plaster, gilt, after Raphael. Benjamin Solomon, "
- 48 Chromo Lithographs. Thomas Hunter.
- 11 Color Printing and Lithographing. Taylor & Smith, "
- 39 Colored Photographs, Magic Lantern Pictures. F. Langenheim, Philada.
- 42 Crayon Photographs. De Morat.
- 32 Crayon Pictures. Stockton Stokes, Philadelphia.
- 44 Crayon Portraits. E. B. J. Weber, "
- 49 Drawings, Engravings, etc. Pupils School of Design for Women.
- 29 Drawings and Paintings. William E. Winner, Philadelphia.
- 34 Embroidered Picture of Benjamin Franklin. Horstmann, Bros. & Co.
- 50 Engravings on Steel. Samuel Sartain, Philadelphia.
- 13 Heliotypes, in Frames and Portfolios. James R. Osgood & Co.
- 6 Heraldic Chasing. S. H. Allen, Philadelphia.

- 44 India Ink Drawing of Locomotive. T. W. Rogers, Philadelphia.
 35 Ivorytypes and Photographs, colored and plain. P. F. Cooper, Philada.
 23 Lithographic Work. Potsdamer & Co., Philadelphia.
 52 Medals. William Barber.
 22 Metal Advertising Signs. Wells and Hope Company, Philadelphia.
 44 Model of a Monument. Nathaniel P. Harris.
 19 Model of the Public Buildings. E. A. Kretschman, Philadelphia.
 27 Oscillating Enameller for Photographs. W. G. Entriken.
 57 Painting. Frances R. Webb.
 28 Paintings in Oil and Water Colors. S. S. Gent.
 10 Pen Pictures. Edwin Metcalf.
 21 Photographs. Broadbent & Phillips, Philadelphia.
 24 Photographs. Suddards & Fenimore, “
 8 Photographs. P. E. Chillman, “
 5 Photographs. F. Gutekunst, “
 43 Photographs, framed. De Morat.
 51 Photographs, Glace, Jewel. T. Brooks.
 21 Photographs in Oil, Plain, etc. B. F. Reimer, Philadelphia.
 4 Photograph Albums. Altemus & Co. “
 38 Photographs of Machinery. A. H. Hemple, “
 17 Photographs of Merchandise, etc. R. Newell & Son, Philadelphia.
 18 Photographic Publications, Lantern Slides, etc. Benerman & Wilson, Phil.
 25 Photo-Mechanical Printing, Woodburytypes. John Carbutt.
 31 Portrait Paintings, Ivorytypes. B. F. Ferguson.
 12 Photo-Lithographic and Wood Engraving. Taylor & Smith, Philadelphia.
 37 Printed Fruit and Can Labels. William F. Geddes, “
 15 Rogers' Groups. James S. Earle & Sons, “
 7 Show Cards, Fancy Written. Robert Steele, “
 16 Sketch Club Portfolio. Taylor & Smith, “
 36 Stereoscopic Pictures and Stereoscopes. James Cremer, “
 2 Tube Oil Colors. Janentzky & Co. “
 53 Water-color Steam Hammer. C. E. Busby, “
 3 Water Colors. Janentzky & Co. “
 14 Wax Figures. Joseph Repetti, “
 46 Wood Engravings. Crosscup & West, “
 54 Wood Engravings, framed, and Engraving Machine. Longacre & Co. Phila.
 58 Wood Engraving, Jas. W. Louderback, Phila.

XVII. Gents' Furnishing Goods, including Canes and Umbrellas.

- 3 Clothing. Wannamaker & Brown, Philadelphia.
 4 Dress Shirts. Carpenter & Lattimer, “
 5 Dress Shirts. William E. Jones, “
 7 Dress Shirts. F. Sachse & Son, “
 8 Dress Shirts. B. R. Little, “

- 13 Dress Shirts. Richard Eyre, Philadelphia.
- 11 Gloves and Gauntlets. Ridgway & Olliphant, Philadelphia.
- 1 Hosiery Goods. Cook & Bro. “
- 9 Miniature Shirt Factory. Shedaker & Lindsay, “
- 6 Pantaloon, and other Garments. E. O. Thompson, Philadelphia.
- 10 Shirts, Old and New Styles. W. L. Clayton, “
- 2 Umbrellas. William A. Drown & Co. “
- 12 Walking Canes, made from the Wood of Independence Hall. Wallace & Keller, Philadelphia.

XIX. Hardware, Cutlery, etc.

- 1 Bolts, Nuts, Washers and Screws. Hoopes & Townsend, Philadelphia.
- 32 Bronze Ware, Bolts and Locks. Henry L. Elder & Sons, “
- 25 Bung Hole Borer. Enterprise Manufacturing Company, “
- 24 Coffee and Drug Mills. “ “ “ “
- 6 Cutlery, Pocket. H. W. Shipley, “
- 14 Cutlery. White & Sansom, “
- 22 Door Butts. Heaton & Denckla, “
- 5 Enamelled and Tinned Cast Iron Hollowware. Stuart, Peterson & Co.
- 30 Files. Alexander Krumbhaar, Philadelphia.
- 3 Files and Rasps. McCaffrey & Bro., Philadelphia.
- 33 Fishing Tackle and Sundries. A. B. Shipley & Co., Philadelphia.
- 9 Hardware. J. B. Shannon, “
- 21 Hardware. Field & Hardie, “
- 34 Hardware. Lloyd, Supple & Walton, “
- 20 Hardware, Axe and other Handles. Field & Hardie, “
- 31 Hardware, Tinned and Japanned Ware. Isaac S. Williams, “
- 15 Hardware, Bronze. Russell & Erwen Manufacturing Co. “
- 11 Hardware, Japanned and Bronzed. Reading Hardware Company.
- 10 Horse Shoes. Budd Doble, Philadelphia.
- 16 Ice Tools. Knickerbocker Ice Company.
- 4 Locks, etc. Hildebrand & Wolf, Philadelphia.
- 23 Measuring Faucet. Enterprise Manufacturing Company, Philadelphia.
- 19 Roofing Sheets. Marshall Bros. & Co. “
- 17 Saws and Tools. Henry Diston & Sons, “
- 26 Saw Set. Enterprise Manufacturing Company, “
- 29 Sash Chains and Attachments. Heaton & Denckla, “
- 8 Scales. Florence Seale Manufacturing Company, “
- 2 Shears and Scissors. L. Harder & Son, “
- 7 Tin Plate. N. & G. Taylor Co. “
- 27 Tobacco Cutter, and Cheese Knife. Enterprise Man'g Co. “
- 18 Trowels, Moulders' and Saddlers' Knives. W. Rose & Bro. “
- 13 Wire. Washburn & Moen Manufacturing Co., New York.
- 12 Wire Cloth, Fourdrinier. Richard Mohler, Philadelphia.
- 28 Wire Cloth of all kinds. Baylis & Darby Manufacturing Co., Philad'a.

XXI. House Buildings Materials, Tiles and Terra Cotta Ware.

- 3 Concrete Work. J. E. Mitchell, Philadelphia.
- 2 Fire Brick Tile. R. C. Remmey, “
- 10 Fire Brick Blocks. Philip Newkumet, Philadelphia.
- 15 Marbleized Slate Mantels. Thompson & Harper, “
- 4 Ornamental Column. Deury & Mellowish, “
- 5 Plaster Ornaments. Deury & Mellowish, “
- 6 Railings. M. Walker & Sons, “
- 14 Soapstone Manufactures. Ezra Pratt, “
- 9 Terra Cotta Statuary, etc. Gossin, “
- 1 Terra Cotta Ware. W. L. Wilson, “
- 12 Terra Cotta Ware. P. B. Mellick, “
- 13 Terra Cotta Ware. G. H. Hamlin, “
- 11 Tiles, and Clay Retorts. Philip Newkumet, “
- 8 Weather Strips. Charles Burnham & Co. “
- 7 Wire Work. M. Walker & Sons, “

XXII. Housekeeping Articles.

- 12 Blacking, Burdict's. J. C. Hurst & Sons, Philadelphia.
- 9 Blacking Cases. E. S. Farson & Co. “
- 5 Cedar Chest. E. S. Farson & Co. “
- 1 Coffee Cooler, Aroma. C. Boyd, “
- 2 Coffee Roaster, Aroma. C. Boyd, “
- 8 Commode. E. S. Farson & Co. “
- 17 Crockery Well. Wilson, Wood & Co., Wilmington, Del.
- 19 Filters and Coolers, Carbon Block. Shock & Kimball, Philadelphia.
- 6 Filter. E. S. Farson & Co. “
- 11 Fountain Griddle Greaser and Scraper. Amanda S. Sherwood, “
- 13 Galvanized Iron Pillar. Pohl & Rosenstein, “
- 15 Head Spouting, with Stand. Pohl & Rosenstein, “
- 3 Ironing Table, Centennial. A. & R. O. Applegate, “
- 14 Metallic Trap Door. Poel & Rosenstein, “
- 16 Match Safe. Orum & Mellor, “
- 4 Refrigerators. E. S. Farson & Co. “
- 20 Refrigerator and Water Cooler combined. John Gravenstine, “
- 21 Sideboard Refrigerator and Water Cooler. John Gravenstine, “
- 7 Water Cooler. E. S. Farson & Co. “
- 10 Water Cooler Stand. E. S. Farson & Co. “
- 18 Water Cooler, with False Bottom. Wm. Wood & Co., Wilmington, Del.

XXIII. India Rubber Goods.

- 2 Caoutchouc and Gutta Percha. Robert Grimshaw, Philadelphia.
- 1 India Rubber Tree. Robert Grimshaw, “

XXIV. Iron and Steel.

- 1 Beam, 9 in., 100 feet long. Potter & Hoffman, Philadelphia.
- 2 Beam, 15 in., 50 and 60 feet long. Potter & Hoffman, “
- 4 Cast Iron (Fire-proof) Girder and Columns. W.W. Hughes & Sons, Phila.
- 7 Cast Steel. Miller, Barr & Parkin, “
- 17 Cemetery Lot Enclosures, Settees and Chairs. Hanson & Kirk, “
- 15 Columns, Square and Round. S. J. Cresswell, Jr. “
- 8 Crucible Steel Locomotive Tyre. William Burnham, “
- 9 Crucible Steel Passenger Car and Engine Truck Tyre. Wm. Burnham, “
- 11 Crucible Cast Steel. Midvale Steel Works, Nicetown, Pa.
- 10 Galvanized Iron. Philadelphia Galvanizing Company.
- 13 Locomotive Steel Tyres. Midvale Steel Works,
- 16 Pig Iron and Ore. George Beetolet, Philadelphia.
- 18 Patent Planished Sheet Iron. A. Wood & Co. “
- 3 Steel and Iron Boiler Plate. Potter & Hoffman, “
- 12 Steel, by Simeon Martin's Process. Midvale Steel Works, Nicetown.
- 14 Steel. Midville Steel Works.
- 5 Tubular Wrought Iron and Steel, and Combined Iron and Steel.
American Tubular and Steel Association.
- 6 Wrought Iron Columns. Potter & Hoffman, Philadelphia.

XXV. Ladies' Wearing Apparel and Fancy Goods.

- 1 Afghan. F. H. Andrews, Philadelphia.
- 2 Artificial Flowers. Birge & Berg, Philadelphia.
- 7 Clothing, Children's. Mrs. E. Keyser, “
- 9 Clothing, Children's. M. Shoemaker & Co. “
- 6 Clothing, Ladies' and Infants. David Wood, “
- 3 Dress Elevators. Charles Tage, “
- 14 Embroidery. Mrs. M. H. Smythe, “
- 4 Ladies' and Misses' Garments. Marter & Co., Philadelphia.
- 8 Ladies' Underwear, etc. B. Linderman & Co., “
- 5 Millinery, Hats and Bonnets. William Brooks, “
- 10 Needlework. Mrs. Wm. P. Tatham, “
- 13 Ruffings, Lace and Fancy Goods. William Huey, “
- 11 Standard Lotta Bustle. A. W. Thomas, “
- 12 The Perfect Bosom Form. A. W. Thomas, “

XXVI. Lamp and Gas Fixtures.

- 3 Day and Gas Light Reflectors. American Reflector Co., Philadelphia.
- 9 Champion Street Lamps. M. B. Dyott & Son, “
- 1 Gas Fixtures. Baker, Arnold & Co. “
- 2 Gas Fixtures and Lamps. Cornelius & Sons, “
- 5 Gas Fixtures. Thackara, Buck & Co. “

- 10 Gas Torches and Taper Holders. William Weber, Philadelphia.
 6 Gas Burners. C. Gefrover, "
 7 Gas Heating Apparatus. C. Gefrover, "
 8 Street Lamps, and Chandelier Goods. M. B. Dyott & Sons, "
 11 Stair Rods and Step Plates. William Weber, "
 4 Patent Sky Lights. Philadelphia Architectural Iron Co.

XXVII. Leather and Morocco.

- 1 Hemlock Sole Leather. Edward Spaulding, Boston, Mass.
 2 Marbled Leather. Deitrich & Whittington, Philadelphia.

XXVIII. Marble, Stone, etc.

- 7 Granite Monuments. Adam Steinmetz, Philadelphia.
 6 Marble Mantel. Adam Steinmetz, "
 4 Marbleized Slate Mantels. Hayes & Coulter, "
 5 Scagliola Marble Work. Matilda Heath, "
 1 Slate Mantels. J. B. Kimes & Co. "
 2 Slate Mantels. Charles Williams, "
 3 Slate Mantels. Wilson & Miller, "

XXIX. Machinery, and Engineers' Supplies.

- 92 Bobbin Frame. Thomas Wood, Philadelphia.
 303 Bells, Cast Iron Farm. Weimer & Birkenbine, Lebanon.
 94 Belt, Main Driving. Sellers Bros., Philadelphia.
 7 Belting, Leather. Alexander Bros., "
 68 Belting, Sewed Canvas and Rubber. R. Grimshaw, Philadelphia.
 76 Belting, Improved Union. Thomas G. Rorer, "
 247 Belting and Packing Hose, etc. Goodyear Rubber Co. "
 112 Blower, Rotary. Potter & Hoffman, "
 219 Blower, Pressure. T. Wilbraham & Bro. "
 9 Boiler, Exeter Sectional. Alexander Bros. "
 154 Boiler, Steam. Gilman & Farran, "
 163 Boiler, Vertical Tubular. Lovegrove & Co. "
 164 Boiler, Vertical Tubular. " "
 187 Boiler, Steel Steam. Edward Wicke, "
 284 Boiler, Vertical Tubular Steam. Norris Iron Co. Norristown.
 311 Boiler, Sectional, No. 2. James P. Wood & Co. Philadelphia.
 312 Boiler, Sectional, No. 3. James P. Wood & Co. "
 325 Bolt Clippers. Chambers Bros. & Co. "
 48 Bolt Cutters. William Sellers & Co. "
 50 Boring Mill. William Sellers & Co. "
 295 Boring Machine. James H. Blaisdell & Co. "
 328 Boring Machine, Locomotive Cylinder. L. B. Flanders, "
 329 Boring Machine, Cylinder. L. B. Flanders, "

- 33 Braiding Machines. S. B. & M. Fleisher, Philadelphia.
 129 Brake, Hydraulic Car. Thomas McBride, "
 343 Brake, Improved Safety. Louis I. Pyott, "
 24 Brick Machine. Chambers Bros. & Co. "
 192 Brick Press, Model of Gregg's. Excelsior Brick and Stone Co.
 250 Brick Press, Hand. Samuel P. Miller, Philadelphia.
 335 Brick Press. F. L. & D. R. Carnell, "
 301 Calculator, Side Valve. John A. Caldwell, Pittsburg.
 188 Calender Machine. J. Morto Poole & Co. Philadelphia.
 171 Caps, Cast Iron Chimney. John C. Wright, Monocacy, Butler Co. Pa.
 326 Car Advertiser. Chambers Bros. & Co. Philadelphia.
 322 Car Bodies, Construction and Ventilation of. R. L. Omensetter, Philad'a.
 132 Car, Passenger Railway. Philad. City Pass. R. R. Co.
 310 Caulking, Samples of. James P. Connery, Philadelphia.
 85 Cedar Ship Tank and Oak Cask. W. H. Burkhardt, Philadelphia.
 86 Cedar Tanks, Square and Round. George J. Burkhardt, "
 80 Centrifugals for Sugar, with Engine. H. G. Morris, "
 110 Chilled Calender Rolls. Pusey, Jones & Co. "
 307 Chopping Machine, (Meat). Rutschman Bros. "
 123 Clamps, Belt. E. Ainsworth, Wilmington, Del.
 281 Coeks and Valves, Brass and Iron. H. Belfield & Co. Philadelphia.
 30 Conical Plats Drug Mill. Hance, Bros & White, "
 83 Coupling for Shafting, Internal Clamp. George V. Cresson, "
 191 Couplings, Cast Steel Car. Philada. Hydraulic Works.
 32 Cracker Machine. David Stuart, Philad'a.
 42 Cutter, Gear. William Sellers & Co. Philadelphia.
 149 Cutter, Heston's Label. R. S. Menamin, "
 251 Cutting Machine for Ovals, Circles, etc. Paeker & Bates, Philadelphia
 268 Cup, Tallow, for Steam Engines. Davis & Dubois, "
 142 Detecters, Low Water, Safety Valves, etc. Henry Snyder & Co. "
 257 Doubler, Worsted. C. Ashton, "
 47 Drill Press. William Sellers & Co. "
 49 Drill Presses. William Sellers & Co. "
 53 Drill Grinder. William Sellers & Co. "
 197 Drill, Radial. E. & A. Betts, Wilmington, Del.
 175 Drill, Spindle. Oberlin, Smith & Co. Bridgeton, N. J.
 233 Drill, Steam, Diamond Pointed. Penn. Diamond Drill Co. Pottsville.
 215 Drill, Self-feeding, Hand. C. Van Hagen & Co. Philadelphia.
 206 Drilling Machine, Radial. Thorne, De Haven & Co. "
 208 Drilling Machine, Vertical, for Metal. Thorne, De Haven & Co. "
 209 Drilling Machine, Portable. Thorne, De Haven & Co. "
 308 Drilling Machine, Self-feeding, Hand. Rutschman Bros. "
 10 Drug Mills. Hance, Bros. & White, "
 296 Elevator, Safety Catch for. William P. Tatham, "
 247 Elevator, Level. C. M. Hunt, "
 275 Elevator Winding Engine. Stokes & Parrish "

- 35 Emery Wheels and Machines. Northampton Emery Wheel Co. Leeds, Mass.
 63 Emery Wheel Plane. Theodore Gantner, Stoudsburg, Pa.
 114 Emery Wheel and Grinder. Lehigh Val. Emery Wheel Co. Weissport, Pa.
 240 Engine, Baxter. Charles H. Smith, Philadelphia.
 241 Engine, Combined Vertical. Kelley, Howell & Ludwig, Philadelphia.
 93 Engine, Eccentric Piston. C. C. Klein, ..
 190 Engine, Fire. Philada. Hydraulic Works.
 135 Engine, Frictional Geared and Hoisting. Williamson & Bro. Philadelphia
 25 Engine, Gold Miniature. Cyrus Chambers, ..
 166 Engine, Horizontal. Lovegrove & Co. ..
 242 Engine, Launch. Kelly, Howell & Ludwig, ..
 36 Engine, Steam, Corliss. Robert Wetherill, Chester, Pa.
 52 Engine, Steam. William Sellers & Co. Philadelphia.
 77 Engine, Steam, Upright. Andrew Watson, ..
 100 Engine, Steam, Oscillating, Jos. Higginbotham. ..
 101 Engine. Steam, Oscillating, and Boiler, ...
 179 Engine, Steam, Horizontal. Jacob Naylor, ..
 218 Engine, Steam. Wilbraham & Bro. ..
 304 Engine, Steam, High Pressure. Weimer & Birkenbine, Lebanon.
 293 Engine, Steam, Whitmore's Patent. Lovegrove & Co. Philadelphia.
 277 Engine, Steam, Vertical. Stokes & Parrish, ..
 143 Engine, The Shapley Steam. Henry Snyder & Co. ..
 162 Engine, Vertical, and Boiler. Lovegrove & Co. ..
 165 Engine, Vertical. Lovegrove & Co. ..
 181 Engine, Vertical, (4). Jacob Naylor, ..
 283 Engine, Vertical, Oscillating Cylinders. Norris Iron Co. Norristown.
 138 Engine Counters and Clocks. Henry Snyder & Co. Philadelphia.
 6 Envelope Machine. Charles J. Cohen, ..
 109 Expanding Tremper Cut Off. Pusey, Jones & Co. ..
 12 Extinguisher, Gardner. Philada. Fire Extinguisher Co.
 131 Eyelet Machiue. Lipman Manufacturing Company, Philadelphia.
 84 Fan, Rotary Circulating, Murray Bacon, ..
 34 Farm Grist Mill. W. L. Boyer & Bro. ..
 122 Felting Boiler. E. Ainsworth, Wilmington, Del.
 221 Fire-Plugs, Stop Cocks and Supply Plugs. R. T. H. Stileman, Philad'a.
 21 Folder, Fast Rotary News. Chambers Bros. & Co. ..
 22 Folder and Paster, sixteen paged. Chambers Bros. & Co. ..
 23 Folder, Adjustable, 8vo. and 12mo. Book. Chambers Bros. & Co. ..
 31 Forges, Keystone Portable, etc. Keystone Portable Forge Co. ..
 119 Freezer, Ice Cream. Charles W. Packer, ..
 15 Frog, Steel Railroad. Wharton R. R. Switch Co.
 201 Gauges, Valves and Fittings. Lovegrove & Co. Philadelphia.
 136 Gauges, Steam and Water, Henry Snyder & Co. ..
 137 Gauges, Vacuum and Hydraulic. Henry Snyder & Co. ..
 147 Gauge, Butter and Lard Cutter and. Sam'l Richards, ..
 195 Governors, Gauges, etc. W. Howard Le Van, ..

- 236 Governor, Steam Engine. Shive Governor Co. Bethlehem, Pa.
 288 Governor, Marine. Jenkins & Lee, Philadelphia.
 289 Governor, Stationary. Jenkins & Lee, "
 342 Governor, American Safety Stop. C. A. Conde & Co. Philadelphia.
 15 Grinding Machines for Wet Substances. Theo. A. Dodge, Boston.
 216 Grinding Machine, Twist Drill. C. Van Haagan & Co. Philadelphia.
 243 Grinding Machine, Knife. Kelly, Howell & Ludwig, "
 79 Gas Apparatus, Details of. H. G. Morris, "
 57 Gas Generator, Monitor Illuminating. Rex & Boekius, "
 339 Gas Machine, Springfield. G. W. Hulme, "
 280 Gas Machine, Victor, A. W. Rand, "
 73 Gas Machine. Keystone Safety Gas Machine Co. "
 75 Gas Machine. Robert L. Cohen, "
 144 Gas Machine, The Improved Steiner. W. Hartness, "
 227 Gas Regulator, Automatic. Allen & French, "
 327 Generator, Wiegand's Patent Steam Safety Sectional
 59 Grindstones and Fixtures. J. E. Mitchell, Philadelphia.
 60 Grindstones and Fixtures. J. E. Mitchell, "
 258 Hammer, Power Spring. S. C. Smith & Co. Manchester, N. Y.
 159 Hammer, Steel Drawing Steam. W. B. Bement & Son, Philadelphia.
 246 Heater, Feed Water. Waters' Patent Heater Co., West Meriden, Conn.
 27 Heating and Ventilating Apparatus combined. Geo. R. Barker, Philad'a.
 337 Holder, Work, for Lathes, etc. William P. Hopkins, Lawrence, Mass.
 11 Hook and Ladder Truck. Philad. Fire Extinguisher Co.
 193 Hook, Patent Eccentric. John T. Meeutcheon, Philadelphia.
 72 Horizontal Ice Cream Freezers. C. G. Blatchley, "
 271 Hydraulic Jack, (15 tons). Dienalt & Eisenhart, "
 78 Hydraulic Elevator. H. G. Morris, "
 16 Hydraulic Hose. R. Grimshaw, "
 38 Hydrant, Fire. R. D. Wood & Co. "
 228 Hydrant, Fire, connected. Snyder & Co. "
 13 Iron, Galvanized, etc. Philad. Galvanizing Co. "
 146 Indicator, Revolution. Edward Brown, "
 69 Injectors, Keystone. Jacob F. Miles & Co. "
 130 Injectors, Little Giant. Rue Manufacturing Co. "
 394 Joining Machine. James H. Blaisdell & Co. "
 37 Keystone Crucible Machine. Adam Newkumet, "
 8 Lathes, Foot. P. E. Chase, "
 44 Lathe. William Sellers & Co. "
 83 Lathes, Hand. Murray Bacon, "
 196 Lathe, Serew Cutting. E. & A. Betts, Wilmington, Del.
 323 Locomotive, Combined Latch and Bolt for. R. L. Omensetter, Philad'a.
 257 Loom, Carpet. Dienalt & Eisenhardt, "
 336 Machines for making Flower-pots, Crucibles, etc. F. L. & D. R. Carnell, "
 185 Machines for Serewing Soles on Boots and Shoes. J. Mundell & Co. "
 254 Mangle or Calender. James Berry, "

- 89 Meat Cutter, Fruit Cleaner, etc. W. H. & S. H. Slocumb, Philad'a.
 106 Mechanics Tools, in Case. Wm. P. Walters' Sons, "
 148 Measure, The Perfect Ice-Cream. Samuel Richards, "
 128 Metal, Anti-Friction. Conrad & Murray, "
 276 Metals, Babbitt's Anti-Friction. Philad. Smelting Co. "
 168 Mill, Vertical Portable Grinding. Amos H. Searfoss, Newark.
 169 Mill, Portable French Burr Grain. Krider, Zendgrof & Co. Philad'a.
 170 Mill, Paint, with Mixer. Krider, Zendgrof & Co. "
 230 Mill, Lightning. Walker, Bros. & Co. "
 232 Mill, Farm. Walker, Bro. & Co. "
 309 Mill, Portable Grain. C. K. Bullock, "
 58 Millstones. J. E. Mitchell, "
 61 Millstones, French Burr. J. E. Mitchell, "
 272 Millstone Dressing Machine, Diamond, Dienalt & Eisenhardt, "
 151 Model of Prismoid One-Rail Railway. Emmor Crew, "
 62 Model of Machine for making Grindstones. J. E. Mitchell, "
 81 Models for Hatch Cover Attachment. Ira D. Spaulding, "
 279 Mortiser and Borer. Godell, Brun & Waters, "
 292 Mortiser, Wood Working Machinery. Jas. H. Blaisdell & Co. "
 158 Motors, Water. Singer Manufacturing Company.
 291 Moulder, Wood Working Machinery. Jas. H. Blaisdell & Co. Philad'a.
 305 Moulding Machine, Wood Working. Mellor & Oram, "
 46 Nut Shaper, Wm. Sellers & Co.. Philadelphia.
 99 Oak Tanned Leather, for Hose and Belting, Eckfeldt & Richie, Phila.
 299 Oils, Lubricating, manufactured from Petroleum, C. T. Myers, "
 300 Oils, Lubricating and Illuminating, Morehouse, Rockfellow & Co. "
 310 Oils, Lubricating and Illuminating, Wm. L. Elkins, "
 320 Packing in Piston, Spring, L. B. Flanders, Philadelphia.
 105 Packing and Weighing Machine, Stewart, Marks, Ralph & Co. Phila.
 199 Paper Cutter, Cone Pulley, Nelson & Gorton Gavitt, Philadelphia.
 229 Paper Maker's Fourd., Wire Cylinder & Dandy Rolls, Wm. Sellers & Co.
 104 Paper Cutting Machines, Brown & Carver, Philadelphia.
 139 Pipe Tongues, Henry Snyder & Co. "
 324 Pipe, Heater, Chambers Brothers & Co. "
 125 Piston, Patent Elastic Metallic, John Massey, Chester.
 182 Piston, 14 inch Steam Cylinder, Jacob Naylor, Philadelphia.
 29 Pneumatic Screen Elevators, Philip J. Schopp, Louisville, Ky.
 278 Planer and Matcher, Endless Bed, Godell, Braun & Waters, Philadelphia
 45 Planer, Wm. Sellers & Co. "
 153 Planing and Flooring Machine, Power, Tainter & Co.
 198 Planing Machine, E. & A. Betts, Wilmington, Del.
 213 Planing Machine, Valve Seat and Metal, Kuhner & Odenall, Philadelphia
 290 Planing Machine, Wood Working, James H. Blaisdell & Co. "
 40 Plumbers, Steam Fitters and Eng's Goods, Cooper, Jones & Cadbury.
 117 Plumbing Fixtures, Weaver & Pennock, Philadelphia.
 90 Power Loom, 3 Box, Thos Wood, "

- 91 Power Loom, Single, Thomas Wood, Philadelphia.
 172 Press for Moulding Glassware, John Bird, "
 244 Press, Printing, Rex & Bockius, "
 222 Press, Printing, Bullock Printing Press Co. "
 173 Presses and Dies for Can Makers, Oberlin, Smith & Co. Bridgeton, N. J.
 174 Presses, Stocks and Dies, Oberlin, Smith & Co. " "
 269 Presses, Seal, for Embossing, Julius Baumgarten, Philadelphia.
 41 Pumps, Iron, Force and Lift, Cooper, Jones & Cadbury, Philadelphia.
 71 Pump, Cucumber Wood, C. G. Blatchley, "
 111 Pumps, Knowles Steam, Potter & Hoffman, "
 124 Pumps, Bilge and Force, E. L. Ritchie, "
 177 Pumps, William G. Rhoads, "
 180 Pump, Feed and Heater combined, Jacob Naylor, "
 189 Pump, Steam, Vertical and Horizontal, Philadelphia Hydraulic Works.
 202 Pumps, Atlas Steam, Lovegrove & Co. Philadelphia.
 204 Pumps, Double Acting, W. H. Harrison, Philadelphia.
 210 Pump, Centrifugal, Fennell & Jones, "
 211 Pump, Steam, " " "
 212 Pumps, Tank and Boiler Feed, Fennell & Jones, Philadelphia.
 220 Pump, Steam, Seldon Double Acting, Chas. H. Brown, Philadelphia.
 239 Pumps, Water Power, John Sash, Buckingham, Bucks Co., Pa.
 285 Pump, Vertical Double Acting, Norris Iron Co. Norristown.
 287 Pump, Hand Force, Jas. H. Billington & Co. Philadelphia.
 126 Pump, Pulsometer Steam, C. H. Hall & Co. Philadelphia.
 320 Pumps, Lift and Force, Alonzo Jones, "
 340 Pumps, Direct Action Steam, C. A. Conde & Co. Philadelphia.
 341 Pumps, Boiler Feed, " " "
 63 Pulley Grinder, with Section Blowers, Theo. Ganter & Co. Stroudsburg
 145 Pyrometers, Edward Brown, Philadelphia.
 298 Rams, Hydraulic, Gawthrop & Son, Wilmington, Del.
 17 Radiator, Steam, John McConn, Philadelphia.
 221 Radiator, Canns' Positive Circulating, Chas. H. Brown, Philadelphia.
 2 Rail Curving Machines, Wm. Wharton, Jr. "
 273 Railway, Automatic, C. M. Hunt, "
 297 Railway Car, J. H. Clark, "
 3 Railroad Safety Switch, Wharton R. R. Switch Co. "
 141 Ratchet Drills, Henry Snyder & Co. "
 200 Rolls, Chilled Calender, Nelson & Gorton Gavitt. "
 150 Saw, Fleetwood Scroll, Trump Bros. "
 235 Saw, Scroll, Truss Arm, R. McChesney, "
 293 Saw, Band, Jas. H. Blaisdell & Co. "
 306 Saw, Band and Jig, Mellor & Oram. "
 126 Sectional Mills, Baugh & Sons, "
 97 Sewing Machine Attachments, Goodrich, Frank Henry, "
 156 Sewing Machine Attachments, Cyrus S. Cushman, "
 14 Sewing Machine Chandler and Edge Trimmer, Cutlan Shoe S. M. Co.

- 19 Sewine Machines, Florence Sewing Machine Company, Philadelphia.
 30 Sewing Machines and Work, Wilson Sewing Machine Co. "
 56 Sewing Machines, Rex & Bockius, "
 82 Sewing Machines, Shuttle, Wilson Shuttle Sewing Machine Co. "
 87 Sewing Machine, Weed Sewing Machine Co. "
 95 Sewing Machines, Elliptic, D. E. Rice, "
 96 Sewing Machines, Monitor, D. E. Rice, "
 115 Sewing Machines, Wheeler & Wilson S. M. Co. Bridgeport, Conn.
 121 Sewing Machines, O. F. Davis, Philadelphia.
 133 Sewing Machines, Work and Case, Grover & Baker S. M. Co. Philad'a.
 134 Sewing Machines, Howe Machine Co. "
 157 Sewing Machine, Singer Manufacturing Co. "
 161 Sewing Machine, Wet Skin, Geo. C. Walter, "
 167 Sewing Machines, American Button Hole S. M. Co. "
 193 Sewing Machine, Davis Vertical Feed, A. B. Felt & Co. "
 205 Sewing Machine Table, Adjustable Table Co. "
 207 Sewing Machine, McLean & Benner, "
 233 Sewing Machine, Secor, D. S. Ewing, "
 232 Sewing Machine, Wilcox & Gibbs, D. S. Ewing, "
 245 Sewing Machine, Jos. Benner, "
 248 Sewing Machines, Device for Driving by Steam, Wm. M. Smith "
 70 Shafting, Hangers and Pulleys, Geo. V. Cresson, "
 102 Shafting Couplings, Jos. Higginbotham, "
 162 Shafting, Variable Speed, Wright & Smith, "
 51 Shaping Machine, Wm. Sellers & Co. "
 214 Shaper, Rotary, Horizontal Drill, C. Van Haagan & Co. "
 43 Slotting Machine, Wm. Sellers & Co. "
 155 Springs, Elliptic Nest Spiral and Volute, Nichols, Pickering & Co.
 178 Steamer, American Road, Davis & Foulke, Philadelphia.
 134 Stocks and Dies, Henry Snyder & Co. "
 270 Stripping and Booking Machine, Tobacco, Jas. F. Tygh, Philadelphia.
 54 Surface Grinder, Wm. Sellers & Co. "
 286 Switch, R. R., Model of, Geo. J. Woodruff, Norristown.
 28 Thresher, Locomotive, Chambers Bros. & Co. Philadelphia.
 282 Ties, Railroad Cross, A. B. Tripler, Philadelphia.
 113 Tools, Machinists, Thorne, DeHaven & Co. Philadelphia.
 160 Tools, Machine, W. B. Bement & Son, "
 249 Traps, Steam, Wm. H. Jenkins, "
 260 Trap, Elliptic Steam, Richards & Fiske, "
 261 Trap, Steam, Alonzo A. Jones, "
 1 Turn Table for Street Railways, Wm. Wharton, Jr., Philadelphia.
 217 Tuyere, Self Gauging Bessemer, Chas. H. Baker, Philadelphia.
 308 Tuyeres, Shell Coil, Weimer & Birkenbine, Lebanon.
 4 Upholsterers' Hair Picking and Cleaning Machine, C. A. Teal, Phila.
 20 Vise, Parallel, and Attachment. Stevenson Vise Co., New York.
 107 Vise, Improved Machinists'. Harrisburg Foundry and Machine Co.

- 103 Valves, Safety. Joseph Higginbotham, Philadelphia.
 183 Valve, Balance Slide, for Steam Engine. Jacob Naylor, Philadelphia.
 194 Valves, Gas, Water and Steam. Chapman Valve Man. Co. Boston.
 226 Valve, Prentiss' Automatic Relief, on Pulsometer of C. H. Hall.
 252 Valve, Balance Slide. John A. Caldwell, Pittsburg.
 262 Valve, Balance Slide, for Steam Engines. Jacob Naylor, Philad'a.
 18 Warp and Cloth Dyeing Machine. Butterworth & Son, "
 176 Washer, Champion Steam. Robert H. Farley, "
 67 Water Wheel and Pump. William G. Rhoads, "
 116 Water Wheel. Weaver & Pennock, "
 66 Wind Mill. William G. Rhoads, "
 108 Wire Guide. Pusey, Jones & Co. "
 253 Wood Working Machine. Richards, London & Kelley, "
 127 Wringer, Crown Clothes. American Machine Co. "

XXX. Musical Instruments.

- 7 Organ, Nonpareil Sunday School and Chapel. Reuben Nichols, Philad'a.
 6 Organ, Chapel. Stanbridge Bros. "
 1 Pianos, Grand Upright and Square. Schomacker Piano Man. Co. "
 2 Pianos, Metallic Toy, and Metallophones. A. Schoenhut, "
 3 Piano, Grand. Albrecht & Co. "
 4 Piano, Square. Albrecht & Co. "
 5 Pianos. Prestien & Berwind, "
 9 Pianos, Steck's and Bradbury's. Gould & Fischer, "
 8 String Instruments, Quartette of. John Albert, "

XXXI. Paints, Colors and Varnishes.

- 3 Dry Lead, Litharge, and Orange Mineral. Wetherill & Bro. Philadelphia.
 1 Lamp Black. Behm & Co., Bridesburg, Pa.
 2 Pure White Lead, ground in Oil. Wetherill & Bro., Philadelphia.

XXXII. Paper Hangings.

- 6 Designs for Paper Hangings, Fresco Paintings, etc. C. J. Barlow, Philad'a.
 1 Paper Hangings. Wilson & Fenimore, "
 2 Paper Hangings, Machine-made. Howell & Bourke, "
 3 Paper Hangings. Howell & Bros. "
 4 Paper Hangings. Nagle, Cook & Ewing, "
 7 Screens of Descriptive Paper Hangings. Alfred G. Miller, "
 5 Wall Paper and Frescoes, Oil painted. O. P. W. P. Man. Co., Bethlehem.

XXXIII. Philosophical, Optical and Mathematical Instruments.

- 12 Atlantic Cable. Mrs. E. Sanguiretti, Philadelphia.
 15 Adjustable Rotary Stand. A. E. Outerbridge, Philadelphia.

- 16 Carbons, for Batterys. D. Thompson, Newark, N. J.
- 3 Clocks. L. H. Spellier, Doylestown, Pa.
- 2 Electrical Instrument. Galvano Faradic Manufacturing Co., New York.
- 11 Electric Burglar Alarm, Bells, etc. Thomas E. Cornish, Philadelphia.
- 7 Electro-Magnetic Mallet, for Plugging Teeth. W. G. A. Bonwell, “
- 13 Lightning Rods. Reyburn, Hunter & Co. “
- 8 Lightning Rods, Vanes, etc. J. D. Rice, “
- 9 Microscopic Apparatus, etc. Joseph Zentmayer, “
- 4 Mathematical, Philosophical and Optical Instruments. J. W. Queen & Co.
- 14 Philosophical and Optical Apparatus. W. Y. McAllister, Philadelphia.
- 1 Surveying and Engineering Instruments. Heller & Brightly, “
- 6 Telegraph Instruments. W. J. Phillips, “
- 10 Watchman's Clock. Shive Governor Co., Bethlehem, Pa.

XXXIV. Printing and Typography.

- 4 Bronstrup Lithographic Press. R. S. Menamin, Philadelphia.
- 2 Chases, Printers'. R. S. Menamin, “
- 1 Dictionary Blotter, Samples of Engraving, etc. Louis Dreka, Philad'a.
- 5 Franklin Printing, and Specimens of Work. Times Printing House, “
- 3 Galley, Patent Brass, for Printers. R. S. Menamin, “
- 6 Lithographic Press and Table. Graf Bros. “
- 7 Sholes & Glidden Type Writer. John T. Graham, “

XXXV. Saddlery, Harness, Trunks and Whips.

- 2 Harness, Saddles and Whips. S. R. Phillips, Philadelphia.
- 1 Three Life-size Horses. S. R. Phillips, “
- 3 Trunk for Mercantile Purposes. Watt & Kennedy, “

XXXVI. Safes and Bank Locks, and Scales.

- 7 Safes, Fire and Burglar. Farrel & Herring, Philadelphia.
- 1 Scales, Dormant Platform and Counter. Fairbanks & Ewing, Philad'a.
- 2 Scale, Iron Frame Railroad Track. Fairbanks & Ewing, “
- 3 Scale, Hay or Coal. Fairbanks & Ewing, “
- 4 Scales, Buoy's Counter. Shive Governor Co., Bethlehem.
- 6 Scales, Assortment of. Moore & Wixsell, Philadelphia.
- 5 Scale, Weights and Measures. H. Troemner, “

XXXVII. School Furniture and Educational Appliances.

- 1 Drawing Board Trestle, Adjustable. John H. Harden, Philadelphia.
- 5 Hickman Patent Slate Cleaner. E. Price & Co. “
- 4 Maps. John L. Smith. “
- 2 School Desk and Seat combined. I. Newton Pierce, “
- 3 School Desks and Apparatus. J. Bancroft & Co. “

XXXVIII. *Soaps and Perfumery.*

- 5 Bi-Carb. Soda, Saleratus, Potash, etc. H. C. Kellogg & Co. Philadelphia.
- 3 Mineral Seouring Soap. William Wrigley, “
- 1 Toilet Soaps and Perfumery. C. R. Taylor & Co. “
- 2 Soap. J. S. & T. Elkinton, “
- 4 Soap, Babbitt's Best, N. Y. City, and Union. H. C. Kellogg & Co. “

XXXIX. *Heaters, (Air and Steam,) Ranges and Ventilators*

- 16 Boilers, Bath and Range, Geo. Myers, Philadelphia.
- 3 Furnaees and Ranges, J. Reynolds & Son, Philadelphia.
- 24 Furnaees, Jas. Spear & Co. “
- 27 Furnae, Hot Air, A. W. Rand, “
- 15 Furnae, Hot Air, McCoy & Roberts, “
- 6 Furnaees, Warm Air, W. H. Harrison & Bro. “
- 7 Grates and Fire Place Fittings, T. S. Dixon & Sons, Philadelphia.
- 5 Grates, Fire, W. H. Harrison & Co. “
- 25 Heaters, Fire Place, Jas. Spear & Co. “
- 4 Heaters, Ranges and Stoves, Fuller, Warren & Co. Troy, N. Y.
- 14 Heaters and Ranges, A. Lautenbach, Philadelphia.
- 2 Heater, Portable. D. Mershons Sons, “
- 8 Heater, Portable, Morris & Haines, “
- 23 Heater, Portable, J. P. Hayes & Bro. “
- 28 Heating Apparatus, Steam, A. L. Jones, “
- 9 Heaters, Wrought Iron, in Brickwork, Morris & Haines, Philadelphia.
- 1 Heater, Air-tight, D. Mershons Sons, “
- 17 Range, Cooking, Stout & Marenbeek, “
- 18 Range, Cooking, McCoy & Roberts, “
- 10 Ranges, with Boiler, Morris & Haines, “
- 21 Range in Brick, J. P. Hayes & Bro. “
- 20 Stoves, Gas Cooking, Chas. Burnham & Co. “
- 19 Stoves, Gas Heating, “ “ “ “ “
- 22 Stoves, Gas and Fluid, J. P. Hayes & Bro. “
- 11 Stoves, Stuart, Peterson & Co. “
- 12 Stoves, Heaters and Ranges, Chas. Williams. “
- 26 Stoves, Heating, Jas. Spear & Co. “
- 13 Stoves, Heaters and Ranges, Leibrandt & McDowell, “

XL. *Miscellaneous Goods.*

- 2 Cigar Shield, Self-Pressing. James M. Tygh, Philadelphia.
- 1 Poeket Books, Satchels, Travelling Bags, etc. C. Rumpp, Philadelphia.
- 3 Wire-Fastened Paper Boxes. H. R. Heyl, “
- 4 Wicker Covered Bottles. Dempsey Wicker Covered Glass Co. “

IVINS & BROTHER,
 MANUFACTURERS AND WHOLESALE DEALERS IN
FURNITURE, BEDDING,
 AND
FEATHERS,

No. 64, 66 and 68 NORTH SECOND STREET,
 Near Arch Street,
 PHILADELPHIA.

JACOB CROUSE,
 DEALER IN
CARPETINGS,

Nos. 70 and 72 North Second Street,
 Below Arch, West Side,
 PHILADELPHIA.

Oil Cloths, Mattings, Window Shades, and every variety of Carpetings constantly on hand.



ROBBINS, CLARK & BIDDLE,
 1124 Chestnut St. Philadelphia,
Importers, Jewelers and Silversmiths,

RELIABLE WATCHES—FINE DIAMONDS—NOVELTIES IN RICH JEWELRY,
 STERLING SILVER AND PLATED WARES—
 FRENCH MANTEL CLOCKS—REAL BRONZES AND FANCY GOODS.

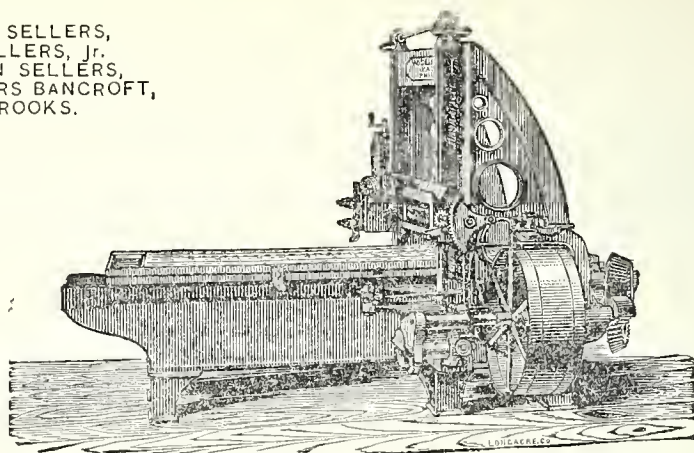
 **New Goods in every department.**

PATRONIZE HOME INDUSTRY



The BEST
"Star" Braids
 AND
 Only Hard
 Twist Braid Made.

WILLIAM SELLERS,
JOHN SELLERS, Jr.
COLEMAN SELLERS,
J. SELLERS BANCROFT,
JAS. C. BROOKS.



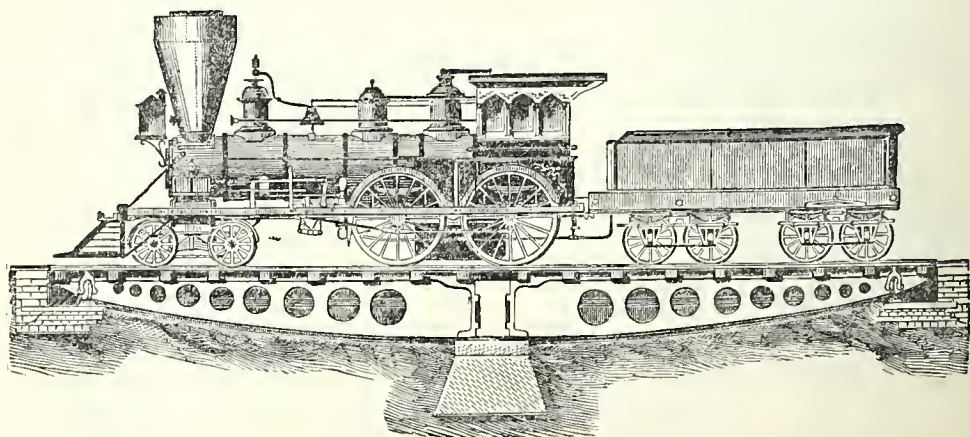
Established 1848.

WM. SELLERS & Co.
Engineers and Machinists,
1600 Hamilton St., Philadelphia,

MANUFACTURERS OF
MACHINISTS, FOUNDERS, SMITHS AND BOILER MAKERS'
TOOLS.

Shafting and Mill Gearing.
Railway Turning and Transfer Tables.
PIVOT BRIDGES, etc.

For particulars please send for Photographs, Specifications, etc., etc.



See page 9.

323

ROBERT GRIMSHAW,

323

323 Chestnut Street, Philadelphia,

WHOLESALE DEALER IN

RUBBER GOODS & FIRE SUPPLIES.

SPECIALTIES:

Blake's Patent Mildew Proof Sewed Hose.

Prunty's Automatic Relief Valve.

Fine English Belting and Packing.

Embedded Spiral Suction Hose.

Glass-Lined and Fine Nozzles.

"Reliable" Screw Couplings.

323

 ALL GOODS WARRANTED.

323

TO THE LADIES!

GOFF'S BRAID

IS THE

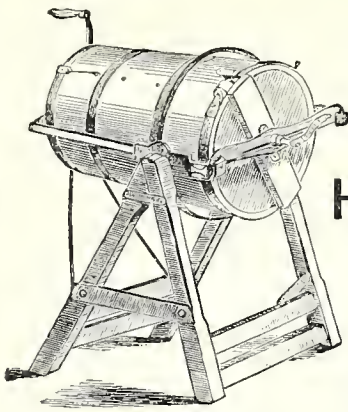
BEST MADE.

GOFF'S BLACK BRAID has no Equal.

FOR SALE EVERYWHERE

IN BLACK, COLORS, AND THE GREY MIXTURES.

Be sure to call for "Goff's Braid."



"The BEST in the WORLD."

BLATCHLEY'S

Horizontal Ice Cream Freezer

[TINGLEY'S PATENT.]

For Saloons, Hotels, Ice Cream Manufacturers or, Families.

STANDS ENTIRELY UNRIVALLED!

With the aid of *this* Freezer a most delicious dessert of Ice Cream, Water Ice, or Frozen Fruits, Custards, &c., may be frozen in from five to eight or ten minutes, at the will of the operator, with almost no trouble and but trifling expense. It is acknowledged the "Best Freezer in the World," and a luxury no family should be without.

The Closed Head will save Ice enough in one season to pay for the Machine. The Tub requires but one filling to freeze. Sizes 3 to 40 quarts. For sale by the trade generally.

Trade Discount liberal. Applications should be accompanied by business card.

CHAS. G. BLATCHLEY, Manufacturer, 506 Commerce St., Philadelphia.

SEE ABOVE FREEZER ON EXHIBITION



MARK
Patented.



TRADE

BLATCHLEY'S

IMPROVED

CUCUMBER WOOD PUMP,

Tasteless, Durable, Efficient and Cheap. The best Pump for the least money. Attention is especially invited to Blatchley's Patent Improved Bracket and New Drop Check Valve, which can be withdrawn without removing the Pump, or disturbing the joints. Also, the Copper Chamber, which never cracks or scales, and will outlast any other

For sale by Dealers and the Trade generally.

CHAS. G. BLATCHLEY, Manufacturer,

See above Pump on Exhibition.

506 Commerce St., Philadelphia, Pa.

ALEXANDER BROTHERS

MANUFACTURERS OF

PURE OAK TANNED

LEATHER BELTING

And Wholesale Dealers in Best Tannages of

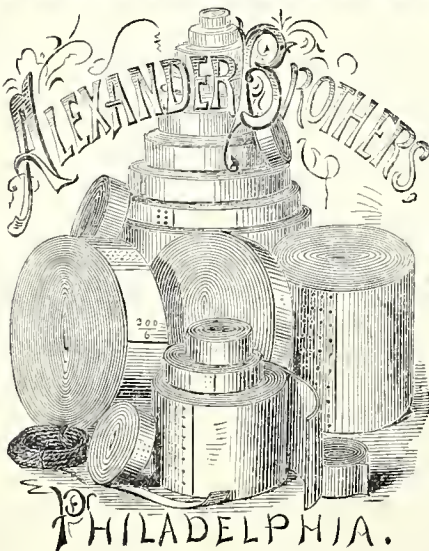
LACE LEATHER

Full stock of all sizes Regular Belting on hand

Special Belts for all kinds of work made to order.

Nos. 410 & 412 North Third St.

Philadelphia, Pa.



PHILADELPHIA SHAFTING WORKS

[ESTABLISHED 1859.]

GEO. V. CRESSON,

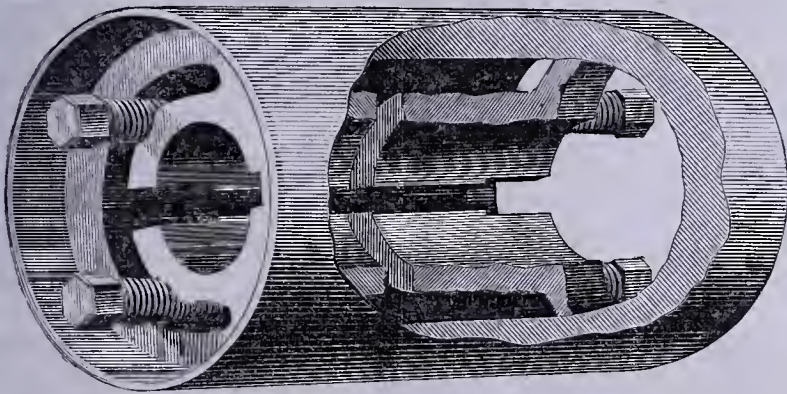
EIGHTEENTH AND HAMILTON STREETS,

PHILADELPHIA, PENNA.

MANUFACTURER OF

SHAFTING

AND ALL ITS APPURTENANCES.



PATENT INTERNAL CLAMP COUPLING
FOR SHAFTING.

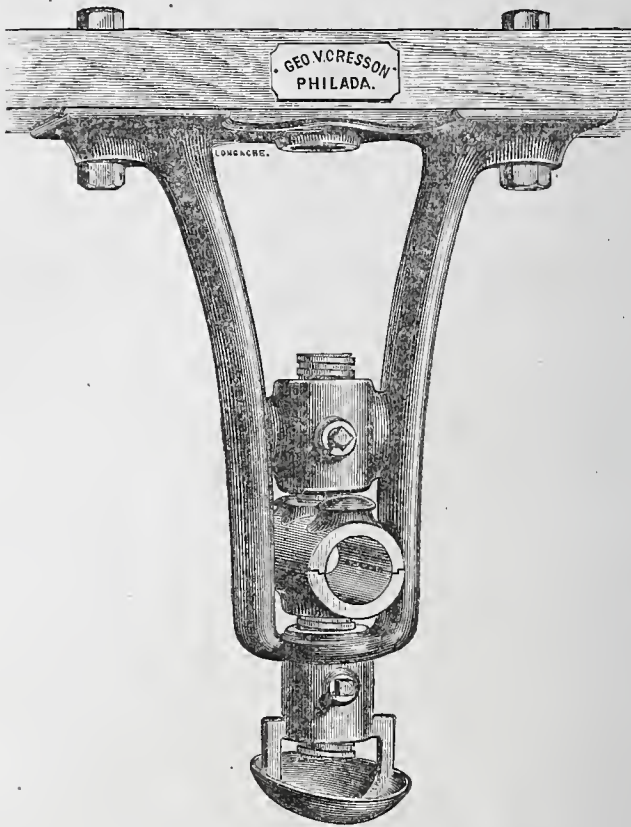
THE MOST SIMPLE AND EFFECTIVE MODE YET DEVISED FOR COUPLING SHAFTS. CAN BE APPLIED BY ANY ONE IN A FEW MINUTES. IT HAS AN EQUALLY POWERFUL HOLD ON BOTH SHAFTS, EQUAL TO A "FORCING FIT." THERE ARE NO BOLTS TO BREAK OR WORK LOOSE. THERE IS NO STRAIN ON THE SCREWS. CANNOT THROW THE SHAFTS OUT OF LINE ON APPLYING IT.

THIS COUPLING IS NOW BEING MANUFACTURED BY SOME OF THE MOST PROMINENT FIRMS IN ENGLAND, SCOTLAND AND GERMANY, AND HAS RECEIVED THE HIGHEST COMMENDATION FROM THE BEST MECHANICS AT HOME AND ABROAD.

PHILADELPHIA SHAFTING WORKS.
 GEO. V. CRESSON,
 PHILA., PENNA.

SIZES.

$1\frac{3}{16}$
 $1\frac{7}{16}$
 $1\frac{11}{16}$
 $1\frac{15}{16}$
 $2\frac{3}{16}$
 $2\frac{7}{16}$
 $2\frac{11}{16}$
 $2\frac{15}{16}$
 $3\frac{3}{16}$
 $3\frac{7}{16}$
 $3\frac{15}{16}$
 $4\frac{7}{16}$
 $4\frac{15}{16}$
 $5\frac{15}{16}$



DROPS.

$1\frac{3}{16}$ & $1\frac{7}{16}$
 6, 8, 10, 13,
 16 ins.
 $1\frac{11}{16}$ & $1\frac{15}{16}$
 8, 10, 13, 16,
 20 ins.
 $2\frac{3}{16}$, $2\frac{7}{16}$, $2\frac{15}{16}$
 10, 13, 16, 20,
 25, 30 ins.
 $3\frac{7}{16}$, $3\frac{15}{16}$, $4\frac{7}{16}$
 10, 13, 16, 20,
 25, 30, 36 ins.
 $4\frac{15}{16}$
 13, 16, 20, 25.
 $5\frac{15}{16}$
 13, 16, 20.

**PATENT IMPROVED BALL and SOCKET ADJUSTABLE
 HANGER,
 COMBINING STRENGTH with LIGHTNESS and SYMMETRY,**

These Hangers are cored throughout, giving the best form for strength known.

Many thousand are in use, and for every variety of work, showing their perfect adaptability.

The Ball and Socket Bearing has great freedom from friction, thereby saving power.

The Parting Hanger of this design can be applied to any point on the line where an extra hanger is required, without taking down the shaft. It can also be used where the shaft cannot be moved endwise.

Kelly, Howell & Ludwig,

720 & 722 FILBERT ST., Philadelphia,

DEALERS IN ALL KINDS OF

Machinery and Machinists' Supplies.

Agents for all leading Manufacturers of Machinery, and Sole Agents in

Philadelphia for the Filchburg Machine Co., P. Blaisdell & Co.,

Brown & Sharpe Manf'g Co., A. F. Prentice & Co., Geo. F.

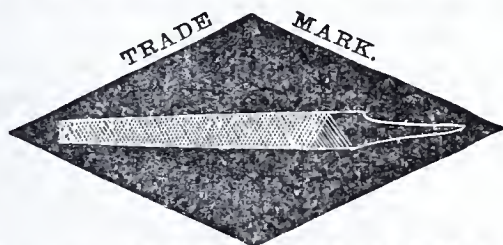
Blake Manf'g Co., Niagara Steam Pump Co.,

New York Safety Steam Power Co.

Otis Bros. & Co., American Oil Cabinet Co., Union Stone Co. and others,

SEND FOR ILLUSTRATED CATALOGUE.

BLACK DIAMOND FILE WORKS.



G. & H. BARNETT,

Nos. 39, 41 & 43 RICHMOND STREET, PHILADELPHIA.

MURTAUGH'S

IMPROVED PATENT DUMB WAITER,

Combines Ease of Working and Security with the utmost Durability, also,

STORE DUMB WAITERS, HOIST WHEELS and SAFETY
INVALID ELEVATORS, of the most approved Patterns.

MERRICK'S PATENT SAFETY APPARATUS

APPLIED TO ELEVATORS.

ISAAC RICHARDS, Manufacturer,

2217 Chestnut Street, Philadelphia.

CAMPBELL'S ROACH POWDER.

Warranted to contain no poison. A safe and effectual exterminator of Cockroaches, the pests of all housekeepers.

This powder is a compound, the result of a series of experiments practically made, with the view of finding out some remedy that will effectually enable housekeepers to get rid of this abominable pest, viz., Cockroaches (large or small), and if used properly, will be found to be the best combination yet devised.

It is perfectly harmless, and may be used freely, a desideratum not always to be had in the many preparations of this kind now in the market.

Price per box, - - - - - 25, 50 and 75 cents.

PREPARED AND SOLD ONLY BY

SAM'L CAMPBELL, Apothecary, 911 Walnut St., Philad'a.

Excelsior Brick & Stone Co.

Principal Works and Quarries, YORK ROAD & HUNTING PARK, } PHILAD'A.
Branch Works, 29th & CUMBERLAND STREETS,

Manufacturers, all the year round, of all kinds of machine and hand-made Bricks. Being dried by artificial heat, and moulded under great pressure, the beauty and uniformity of their bricks is unsurpassed, their strength unequalled. Capacity 150,000 per day.

The Company's Quarries are turning out an elegant quality of stone for Foundation, Face and Rubble Pavement. The stone has a fine rise and bed. *Deliveries of Bricks and Stone can be made in any quantities, and at lowest Cash Prices.*

Business Office, 309 Walnut St.

E. J. MATHEWS, President.
W. D. COMEGYS, Treasurer.

Building and Housekeeping Hardware

LOCKSMITH AND BELL HANGERS' MATERIALS,

REAL BRONZE DOOR FURNITURE,

Speaking Tubes put up. Bells Hung and Repaired.

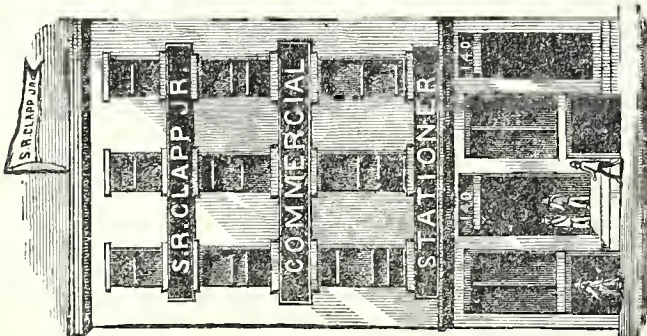
Table Knives and Forks, Pocket Knives, Door Springs, Spring Hinges,

ALL CHEAP FOR CASH.

J. B. SHANNON, 1009 Market St., Phila.

THE EASY WRITER.

Rail Roads, Steamship Lines, Banks,
AND CORPORATIONS
SUPPLIED



CLAPP'S CELEBRATED PEN.

BLANK BOOKS, INKS, FLUIDS,
Mucilage, Pens, Pencils, Paper,
Envelopes, Presses, &c., &c.
140 South Third Street, Phila.

CHARLES MULLIKIN,
IMPORTER OF SANITARY GOODS,

MANUFACTURER OF THE

Patent Seamless Bath Tube.

PLUMBERS' MATERIALS.

Office and Salesroom,

Factory and Salesroom,

939 MARKET STREET,

SIXTH AND BERKS STS.

PHILADELPHIA.

GROVER & BAKER'S

IMPROVED

ELASTIC STITCH AND SHUTTLE STITCH

Sewing Machines.

THE VERY BEST IN USE.  A pamphlet containing samples of both the GROVER & BAKER Stitch and the Shuttle Stitch in various fabrics, with diagrams, will be furnished, on request, from our offices throughout the country.

This is the only Company that affords the purchaser a choice of stitch.
Office, 730 Chestnut Street, Philadelphia.

The New American Sewing Machine.



IMPROVED SELF THREADING SHUTTLE.

Nothing like it for Ease and Simplicity of Operation.

ADAPTED TO EVERY VARIETY OF WORK.

The only Sewing Machine which gives a full outfit, including Goodrich Tucker, and Johnson Ruffler without extra charge.

Office and Salesrooms, 1318 Chestnut St.
Manufactory, 20th and Washington Ave.

Good Agents Wanted at Liberal Salary.

S. C. UPHAM,
PATENT MEDICINES & PERFUMERY,
25 South Eighth Street, Philadelphia.

Lubin's and Rimmel's Extracts.

*Superior Cologne and Bay Rum,
Preparations for the Hair and Complexion,
French, English and American Soaps, Brushes, Combs, &c.*

AGENT for HUNT & CO.'S and GOURAUD'S PREPARATIONS.

ESTABLISHED 1866.

WILLIAM HOLZER,
No. 1128 MARKET STREET, PHILADELPHIA.
PRACTICAL MANUFACTURER OF
Druggists, Chemists, Perfumers and Philosophical
GLASSWARE.

 Glass Syringes, Homœopathic Case and Sample Vials. Also Barometers, Thermometers, Hydrometers, Spirit-Levels, Test Tubes, Breast Pipes, Breast Pumps, Pessaries, Nipple Shields, Cupping Glasses, Liquor and Coal Oil Thieves. Thermometers for Distillers, Brewers, Sugar Houses and Chemical Laboratories. Glass Tubing for Water, Steam and Mercury Gauges.

N. B.--PARTICULAR ATTENTION paid to GLASS BLOWING.

GRANULAR EFFERVESCENT

Citrate of Magnesia,

Convenient for Travellers ; Economical for Families ; Invaluable for Physicians ;

ALSO, THE GRANULAR EFFERVESCENT

Salts of Vichy, Kissengen, Congress, Crab Orchard, &c.

In a condensed and economical form for reproducing a draught representing the natural waters. Manufactured by

KEASBEY, MATTISON & RUTTER.....PHILADELPHIA.
OLD BY ALL DRUGGISTS.

ESTABLISHED 1835.

W. GARNER & SON, Wagon Builders,

Nos. 205, 207 & 209 North Fortieth St.,
PHILADELPHIA.

Drawing
Studies.

JANENTZKY & CO.

Mathematical
Instruments.

MANUFACTURERS OF

Oil & Water Colors,

Importers of and Dealers in Artists' Materials, Engravings,
Decalcomania, and Wax Flower Materials,
No. 1123 CHESTNUT ST.

Chromos.

PHILADELPHIA.

Drawing Papers.

The Philadelphia Foot Lathe

MANUFACTORY OF

MURRAY BACON.

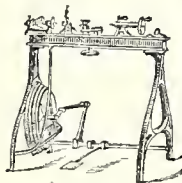
Rear 623 Commerce St.

SUPPLIES THE

Amateur & Artisan

WITH

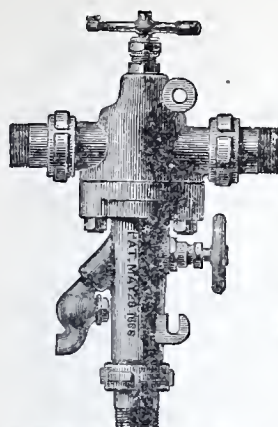
8 in. Swing, 4 ft. long



6 in. Swing,
17 in. Long.

EVERY VARIETY OF SMALL LATHES AND THEIR ATTACHMENTS.

See Samples on Exhibition.

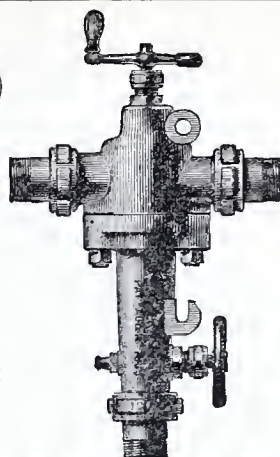


GIFFARD

Injector,

FOR

Feeding Boilers.



WILLIAM SELLERS & CO.

1600 Hamilton Street, Philadelphia.

New York Office 93 Liberty Street.

We beg leave to call attention to the fact that we have been the sole manufacturers of the Giffard Injector in this country from its first introduction into public use, fourteen years ago. We have thoroughly tested all known forms of this useful instrument, and have introduced many valuable improvements. We now offer four kinds of Injectors, namely:

Patent Self-Adjusting Injector.

Patent Self Adjusting Injector, without St. Spindle.

Patent Adjustable Injector.

Patent Adjustable Injector, without Steam Spindle.

Price List and Table of Capacities.

SELF-ADJUSTING INJECTORS.

Terms Cash upon delivery at our Works.

Boxing and Hauling Extra, at Cost.

		PRICES AT OUR WORKS.				Size of Pipe for Connections.	Pressure of Steam in pounds		
		SELF-ADJUSTING NOZZLE.		SELF-ADJUSTING NOZZLE, without Steam Spindle.			10	60	120
SIZE.		Brass Body Polish.	Iron Body.	Brass Body Polish.	Iron Body.		CUBIC FEET OF WATER DISCHARGED PER HOUR.		
No.									
2		\$22	\$18	\$19	\$15	1½ in.	7.8	11.2	15.2
3		30	25	27	22	1¾ “	18.3	26.7	36.8
4		42	35	39	32	1 “	34.8	49.5	67.4
5		55	45	51	41	1¼ “	54.7	78.	106.
6		70	55	65	50	1½ “	79.3	113.	153.7
7		85	65	80	60	1½ “	108.3	154.5	209.9
8		100	75	94	69	2 “	141.7	202.5	275.5
9		115	85	108	78	2 “	179.7	256.4	348.5
10		130	95	122	87	2 “	222.	316.9	430.7
12		150	115	140	105	2½ “	320.3	457.	621.3

~~Adjustable~~ Adjustable Nozzle Injector same price as above.

~~Capacity of~~ Capacity of Adjustable Nozzle Injector 1/8 less than above.

PLEASE SEND FOR CIRCULAR

See page 2.



Hyacinths, Tulips, CROCUS, LILIES,

And all other Bulbs for planting in the Autumn; also Bulb Glasses,
Fancy Flower Pots, Fern Cases, Rustic Work, and
WINTER FLOWERING PLANTS in great variety.

The Largest and Finest Assortment in the Country.
PRICES MODERATE.

Descriptive Catalogues mailed to all applicants **FREE.**

DREER'S GARDEN CALENDAR issued Jan. 1st, 1875, will contain complete lists of
VEGETABLE, FLOWER and Grass Seeds, Plants and every requisite for the Flower and
Vegetable Garden and Greenhouse. Mailed to all applicants **FREE.**

HENRY A. DREER, 714 Chestnut Street,
Philadelphia, Pa.

DUTCH BULBOUS ROOTS.

Hyacinths, Tulips, Crocus, Lilies.

ALSO, A GREAT VARIETY OF

BULBS FOR FALL PLANTING;

ALSO, BULB GLASSES OF VARIOUS DESIGNS AND PATTERNS.

Every variety of Garden, Field and Flower Seeds,
OF SUPERIOR QUALITY, AT

Collins, Downs & Co.

Warehouse, 1111 and 1113 Market St., Philad'a, Pa.

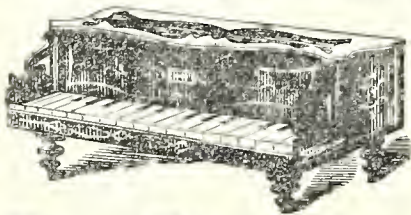
EDWARD A. KRETSCHMAN, MODELER,

906 North Twelfth Street, Philadelphia, Pa.

Architectural Models of Buildings made

AND INSIDE DECORATIONS PROMPTLY ATTENDED TO.

See Model of Public Building on Exhibition.



ALBERT SCHOENHUT

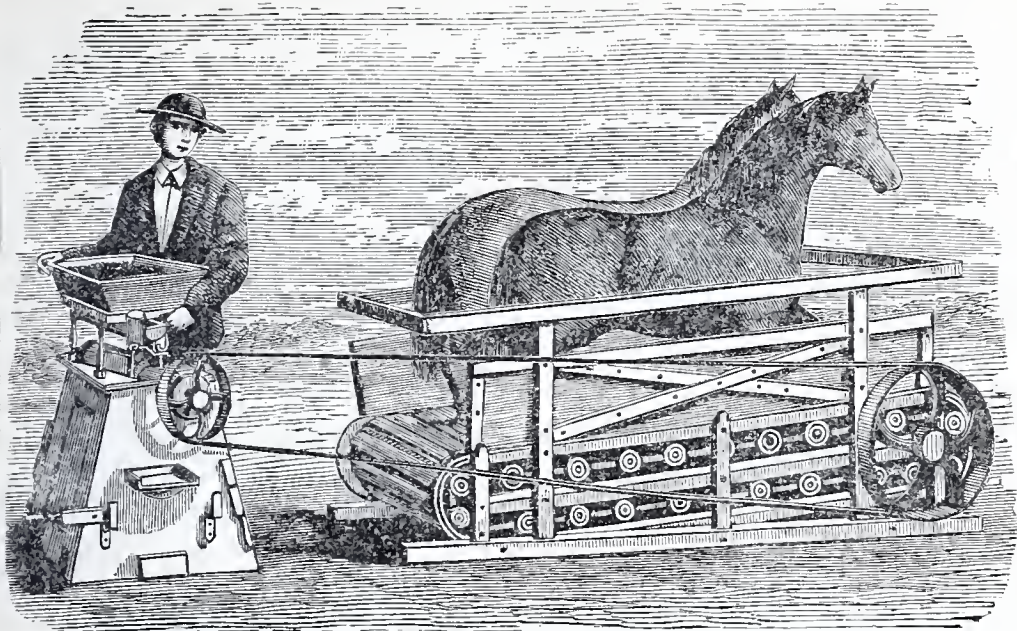
MANUFACTURER OF

PATENT METALLIC

Toy Pianos and Metallophones,

Factory 2337 FRANKFORD AVE., Philadelphia.

The white and green cars of the Second and Third St. P. R. R. pass the door.



The Union Railway Horse Power,

Represented in the above cut, is very much superior to other Railway powers, on account of producing more power with much less elevation. *Send for Descriptive Circular.*

The Premium Farm Grist Mill,

Represented in the above cut, is the most simple, cheap and durable Mill for Grinding all kinds of Grain rapidly, and is adapted to all kinds of powers. *Send for Descriptive Circular.*

ALSO, MANUFACTURERS OF

Threshers Threshers and Cleaners Cross Rye Threshers ... Hay, Straw and Fodder Cutters ... Corn Shellers, and every variety of approved implements.

WM. L. BOYER & BRO.

2101 GERMANTOWN AVE., Philadelphia.

Hanson & Kirk,

S. W. corner of Twelfth and Noble Streets,
PHILADELPHIA,

Manufacturers of Pipe, Gates, Ornaments, Settees, Chairs, Eyes, Sockets,
Name Plates, of Galvanized Iron or Brass, for

CEMETERY LOT ENCLOSURES.

WILLIAM WILER,

MANUFACTURER OF

STAIR RODS,

Wax-Tapers, Paper-Holders, and Escutcheons,

225 South Fifth Street,

(BELOW WALNUT,)

PHILADELPHIA.

Jackson Bros.
PRINTERS

404 Library Street,

PHILADELPHIA.



Philadelphia Scale and Testing Machine Works.

RIEHLÉ BROTHERS,

SUCCESSORS TO { ABBOTT & CO.
BANKS, DINMORE & CO.

SCALES,

TESTING MACHINES,
FOOT MORTISERS.

Established 1846.
9th and Coates Streets,
PHILADELPHIA.

93 Liberty Street,
NEW YORK.

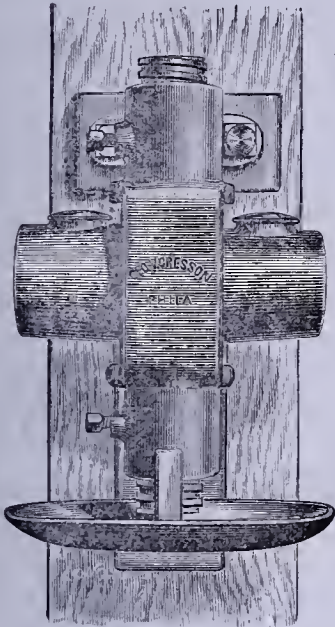
285 Liberty Street,
PITTSBURGH.

Special attention given to Repairing.

PHILADELPHIA SHAFTING WORKS.

GEO. V. CRESSON,

PHILA., PENNA.



BALL AND SOCKET POST HANGER.

SIZES.

$1\frac{7}{16}$, $1\frac{11}{16}$, $1\frac{15}{16}$, $2\frac{3}{16}$, $2\frac{7}{16}$, $2\frac{11}{16}$, $2\frac{15}{16}$
 $3\frac{7}{16}$, $3\frac{15}{16}$.

ALL are 6 in. to centre.

COUNTER HANGERS,

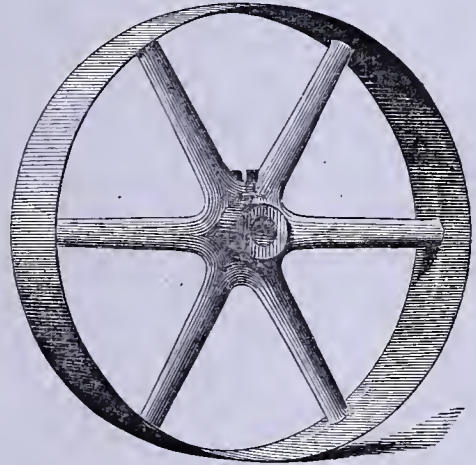
$1\frac{1}{8}$, $1\frac{5}{8}$, $1\frac{1}{2}$, $1\frac{3}{8}$, $1\frac{7}{8}$, Diam.
6, 8, 10, 12, 13, 16 in. Drops.

These Hangers have movable
shipper arms.

CLAMP BOXES OF ALL SIZES

Ball and Socket Pillow Blocks,
all sizes, $1\frac{3}{16}$ to $5\frac{1}{16}$.

LOOSE PULLEY HANGERS.



STRONG and WELL PROPORTIONED PULLEYS,

From 2 inches to 10 feet in Diameter.

EVERY PULLEY
ACCURATELY BALANCED.

IMPROVED PULLEYS, MADE in HALVES.

SPECIAL ATTENTION is called to this
mode of making these Half or Split Pulleys,
as much care has been given to perfecting
every detail. The joint can, with difficulty,
be seen, and they are as strong as a whole
Pulley.

MULE PULLEYS,

From 4 in. to 20 in. Belt.

These take the place of Bevel gears and
run noiselessly, also save much friction.

THEY ARE ADJUSTABLE IN ANY
POSSIBLE DIRECTION.

PHILADELPHIA SHAFTING WORKS.
GEO. V. CRESSON,
PHILA., PENNA.

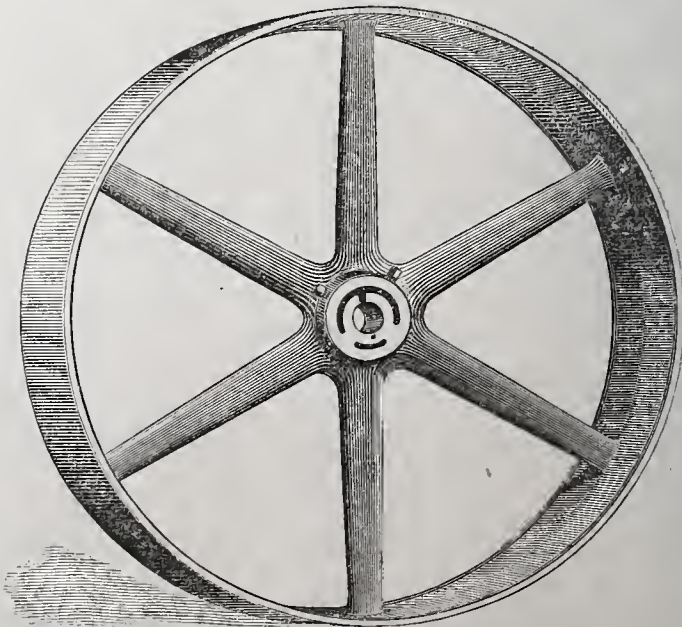
SHAFTING,

Comprising everything connected with the transmission of Steam Power furnished at the above place. ALL WORK is thoroughly tried before being sent away, EVERY PIECE is made to guage and all parts are interchangeable.

SUGGESTIONS.

WHEN ORDERING.

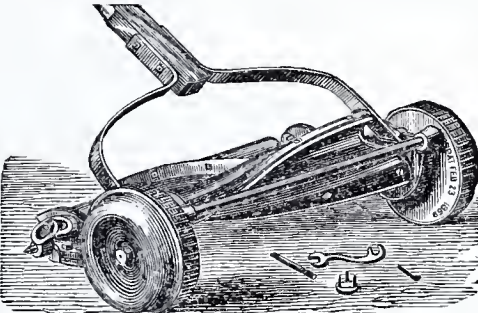
- SHAFTING.** It is necessary to state whether one end only or both ends require key seating. Sketches of work should always be sent. The first, or receiving shaft, should be larger in diam. and should have two or more bearings. The ends of large shafts should not be turned down to connect with smaller shafts as a reducing coupling is provided for this purpose.
- PULLEYS.** Be careful to give the diam. FIRST, then the width of face and the bore EXACT, and whether high or straight on the face.
- HANGERS.** Give the EXACT bore and the drop as per length given with description of Hangers.



PULLEY WITH PATENT INTERNAL CLAMP HUB.

THE PHILADELPHIA LAWN MOWERS.

Over 20,000 in use.

Width of Cut.	Style.	Weight.		Retail.
10 in.	Roller,.....	28		\$15 00
14 in.	6½ in. Drive Wheels,	37		20 00
16 in.	" "	41		24 00
18 in.	" "	46		26 00
20 in.	" "	50		28 00
15 in.	10½ in. Drive Wheels,	63		25 00
20 in.	" "	75		30 00
30 in.	Draft Pole,.....	275		90 00
30 in.	Seat and Shafts,.....	315		110 00

THE BEST.

Send for descriptive circular to

GRAHAM, EMLIN & PASSMORE,

PATENTEES AND MANUFACTURERS,

631 MARKET STREET, Philadelphia.

THOMAS WALTER.

Established, 1831.

WARNER WALTER.

WM. P. WALTER'S SONS,

1233 Market Street, Philadelphia,

AGENTS FOR

Bird's Patent Differential Pulley Blocks,

NORTHAMPTON EMERY WHEEL CO'S

Emery Wheels, Grinding Machines, and Saw Gummars.

CARPENTERS' AND MACHINISTS' TOOLS,

AND

HARDWARE.

Established 1779.

WETHERILL & BRO.,

Manufacturers of

WHITE LEAD,

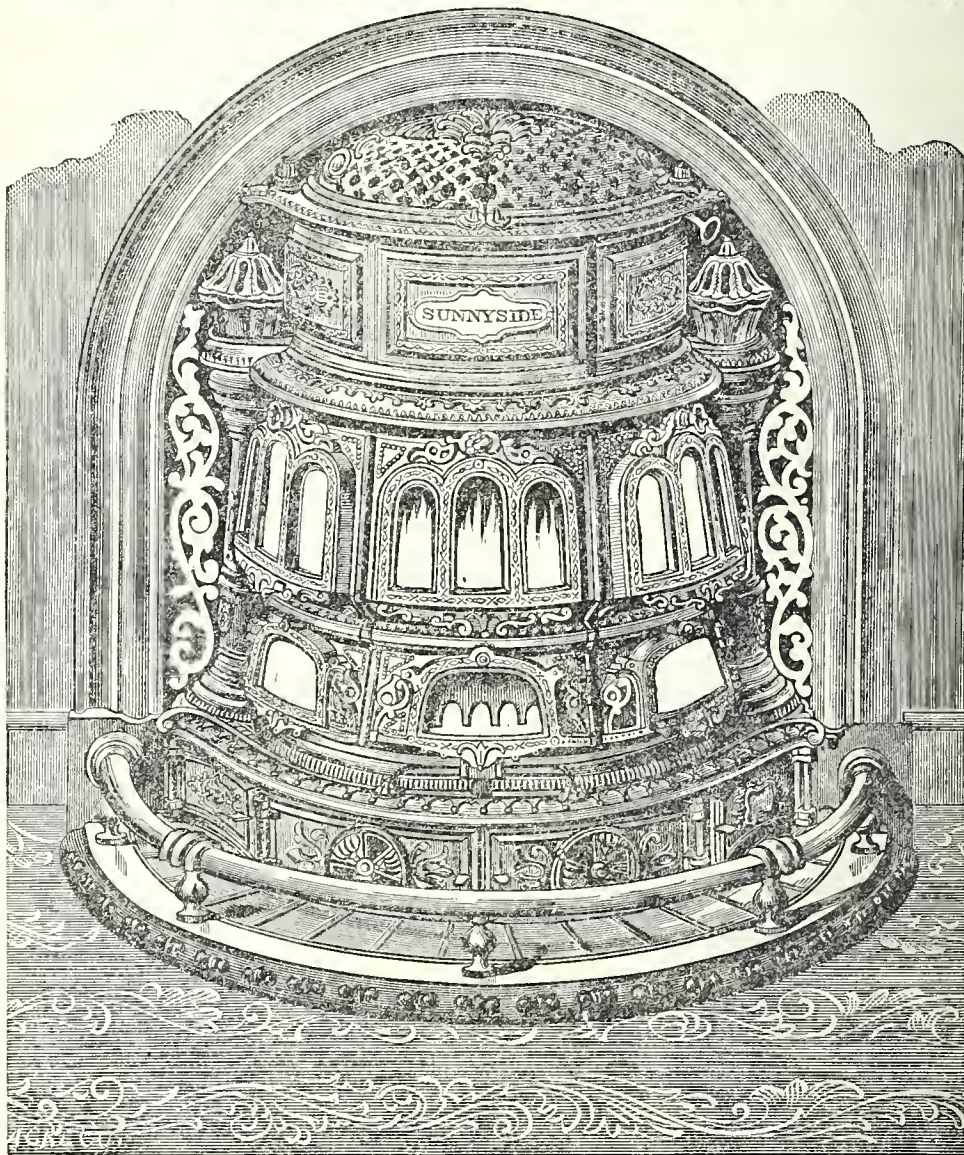
Red Lead, Litharge & Orange Mineral,

OFFICES,

Thirty-first St. below Chestnut, Philadelphia.

STUART, PETERSON & CO.

THE 1874 IMPROVED DOUBLE MICA SECTION SUNNY SIDE FIRE-PLACE HEATER.



Send for samples, and examine the NEW FIRE-PLACE HEATER. It embraces all the good points that makes our old Sunny Side so popular.

Manufacturers also of TINNED and ENAMELLED HOLLOWWARE and HARDWARE GOODS. Also COOKING and PARLOR STOVES, of improved varieties, such as Barley Sheaf, Altoona Cook, Rising Sun, &c.

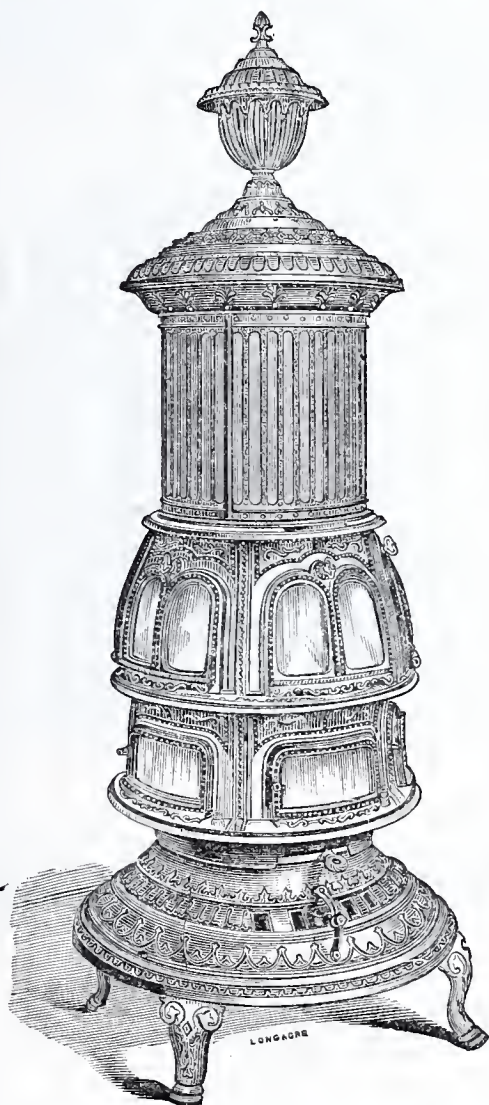
STUART, PETERSON & CO.
Broad and Noble sts., Philad'a.

STUART, PETERSON & CO.'S CANOPY PARLOR STOVE

DOUBLE DRAFT BASE BURNER.

MANUFACTURED BY
STUART, PETERSON & CO.,

Broad and Noble Streets, Philadelphia.



CHARLES WILLIAMS & CO.,
1132 MARKET STREET.

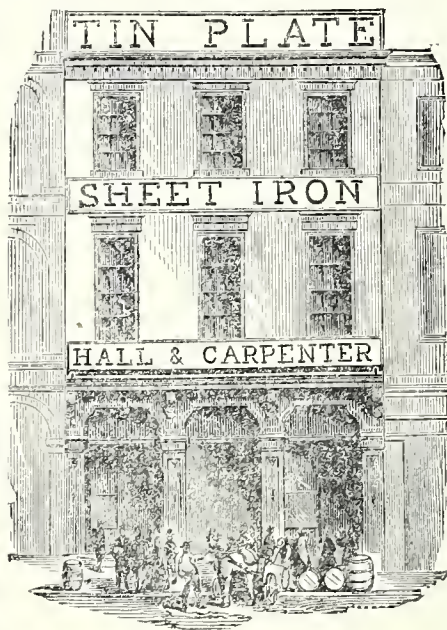
AGENT FOR THE SALE OF CANOPY'S IN PHILADELPHIA,

A Grate that Requires no Poker.
CLINKERS AND ASHES EASILY REMOVED.

Hall & Carpenter

IMPORTERS OF & DEALERS IN

TIN PLATE
 PIG TIN
 PIG LEAD
 PIG COPPER
 ANTIMONY
 SPELTER
 SHEET COPPER
 BOLT COPPER
 WIRE



SHEET IRON
 ROUND IRON
 HOOP IRON
 RIVETS
 REGISTERS
 SHEET BRASS
 SHEET ZINC
 CRUCIBLES
 WIRE

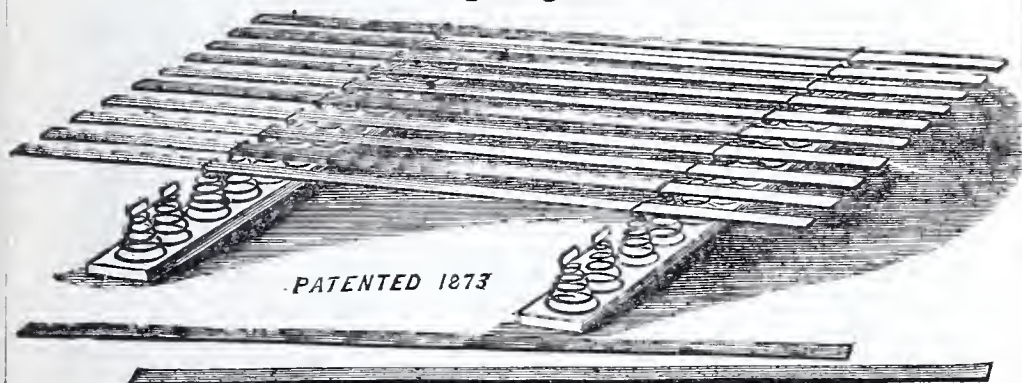
TIN PLATE & SHEET IRON
 AND METALS

709 MARKET ST. PHILADELPHIA

JONES' COMPOUND BED SPRING

Has no superior among its high or low priced competitors, and is the only

Double Coiled Spring in the Market.



ADVANTAGES OF **Jones' Compound Bed Springs.**

In coming before the public with an article of necessity in every well regulated sleeping apartment, "JONES' COMPOUND BED SPRING" meets the requirement, and found to combine more advantages than any that have yet been offered to the public, some of which we will note. It consists of two coupled **Spiral Springs**, each surmounted by independent loops for the reception of the slats, springs, loops and coupling constructed of one piece of wire, (as they brace each other) rendering them more **steady, strong and durable** than single Springs. There are no leathers to break, Springs to slip off slats, or slats to slip off Springs, as they are all held fast by loops and staples.—This **Spring Bottom** is easily adjusted to cord, sacking bottom bedsteads, or any other, either old or new styles, as we have castings to fasten the Springs down on the inside of bedstead (and not increase height of bed). All kinds of **mattresses or beds** can be used, as the Spring slats protect the bedding and prevent it from **bagging, chafing or cutting**. The Springs are so adjusted that parties weighing from 100 to 500 lbs. do not sag them in the centre, and strain the side of the body that is downwards. There is no sacking, webbing or original cross slats, as they all afford hiding places for bugs, (a pest to housekeepers.)

This Spring is perfectly **noiseless**. Can supply thousands of references. Within the range of moderate means,

From \$5.00 to \$7.00,

According to width of Bedstead.

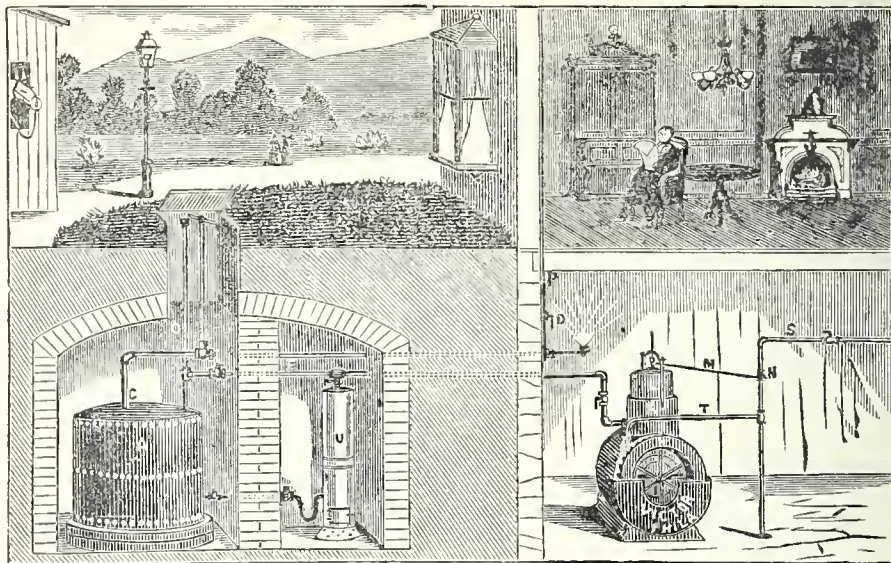
The attention of Hotel, Boarding House Keepers and others is called to the above Spring.

A LIBERAL DISCOUNT TO THE TRADE.

FOR SALE WHOLESALE AND RETAIL BY

W. W. Jones, Patentee and Manufacturer
228 South Second St., below Dock, Philad'a.

THE VICTOR GAS MACHINE



Is the result of Professor Lowe's thorough knowledge of, and familiarity with, the chemical and physical laws relating to the manufacture of Gas, and combines the following advantages, which are absolutely and invariably the requisites of a good Gas Machine, viz:

SAFETY, DURABILITY, SIMPLICITY and ECONOMY.

Manufactured by

A. W. RAND, 124 N. Sixth Street, Philadelphia,
Where one can be seen in operation.

ESTABLISHED 1859.

P. EDW'D CHILLMAN & CO.

SUCCESSORS TO JAMES CREMER,

Artists and Photographers,

No. 18 SOUTH EIGHTH STREET,

(ABOVE CHESTNUT ST.,)

PHILADELPHIA.

Life Size Portraits finished in Colors, India Ink or Crayon. Photo-Miniatures on Porcelain. Old Pictures Copied and Enlarged, and Finished in any Style.

JOHN C. HURST & SONS,
WHOLESALE DRUGGISTS,

IMPORTERS AND WHOLESALE DEALERS IN

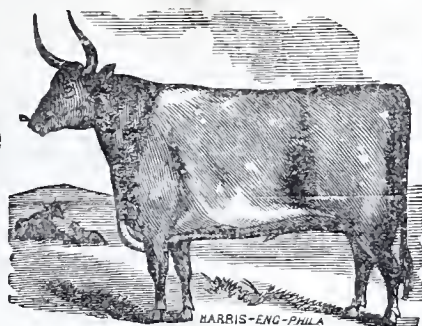
English, French and German Drugs, Chemicals, Oils,
PAINTS AND WINDOW GLASS.

MANUFACTURERS OF

Burdiet's Blacking, Stove Polish, and Fickardt's Cattle Powder,
No. 925 MARKET STREET, PHILADELPHIA.

ESTABLISHED 1842.

THE
Oldest House
IN THE
TRADE.



THE
ORIGINAL
MANUFACTURER.

ATMORE'S
CELEBRATED
MINCE MEAT.

THE ONLY RELIABLE.

ALWAYS GUARANTEED.

ATMORE'S
GENUINE ENGLISH
PLUM PUDDING,

Equal to the Imported at very greatly Reduced Prices.

ALL OF THE VERY BEST MATERIALS.

CALL OR SEND FOR CIRCULARS,

136 SOUTH FRONT STREET,
PHILADELPHIA.

Patents Obtained for Inventions
BY
CONNOLLY BROS.,
Solicitors of Patents and Counsellors at Law,

OFFICES :
108 S. Fourth St., (Provident Building,) Philada., Pa.
AND
608 Ninth Street, opposite U. S. Patent Office, Washington, D. C.

TERMS.

No Charge for Preliminary Examination.

No Fees in advance.

No Fees unless Successful.

No Fee until the Patent is Allowed.

Rehearings obtained on REJECTED CASES. INTERFERENCES, APPEALS and EXTENSIONS conducted. TRADE MARKS AND LABELS registered. Copyrights secured. Patents obtained in Foreign Countries. Suits for INFRINGEMENTS of Patents, Trade Marks and Copyrights prosecuted and defended.

Patent Manual sent or presented *free* on application.

JOSEPH ZENTMAYER,
OPTICIAN.

MANUFACTURER OF

MICROSCOPES

No. 147 South Fourth Street, Philadelphia.

WEAVER & PENNOCK,
PLUMBING,
GAS AND STEAM FITTING,

S. E. Corner Seventh and Filbert Streets,

JOHN J. WEAVER,
J. SELLERS PENNOCK.

PHILADELPHIA.

ELEGANT DECORATIONS

For Drawing-Rooms, Libraries, Parlors, Dining-Rooms,
Chambers, in

CURTAINS AND FURNITURE

Of the best modern and antique forms, and especial care given to the complete
furnishing of apartments.

WALRAVEN,

1105 CHESTNUT STREET.

CHARLES BULLOCK.

EDMUND A. CRENSHAW.

SYLVESTER J. BAKER.

BULLOCK & CRENSHAW,

CHEMISTS AND IMPORTERS,

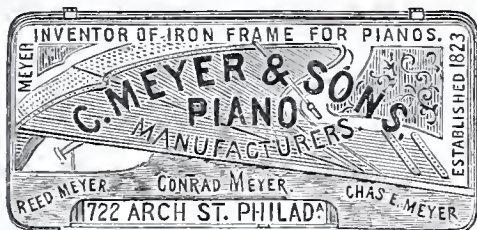
WHOLESALE DRUGGISTS,

Manufacturers of Sugar Coated Pills and Granules,

528 Arch St., below Sixth, and 531 North Street,

PHILADELPHIA.

Prize Medals and Testimonials awarded to



By FRANKLIN INSTITUTE, and Exhibitions in New York, Boston, Balti-
more, &c., also, WORLDS GREAT FAIR, London, England,

HENRY TROEMNER,

MANUFACTURER OF FINE

Druggist, Grocer and Jewelers

Scales and Weights

710 Market St., Philadelphia.

PATENT AGENCY.

ALL BUSINESS RELATING TO PROCURING
AMERICAN and EUROPEAN PATENTS

CONDUCTED BY

STEPHEN USTICK,

134 South Fourth Street, Philadelphia.

Residence, No. 1217 North Twelfth Street.

FURNITURE WAREROOMS, 18 NORTH NINTH ST.

WM. HEACOCK,

MANUFACTURER AND DEALER IN

HARDWOOD FURNITURE.

WOVEN WIRE SPRING,

Hair and Husk Mattresses

ON HAND.

REPAIRING, VARNISHING and UPHOLSTERING promptly attended to.
FURNITURE carefully Packed, Removed and Stored.

FURNITURE CARS TO HIRE.

REEVE L. KNIGHT & SON,

CARPETS,

Oil Cloths, Mattings,

1222 Chestnut Street,

Reeve L. Knight.
Hartley Knight.

PHILADELPHIA.

WM. & HARVEY ROWLAND,

MANUFACTURERS OF

Springs, Steel & Norway Iron,

FRANKFORD,

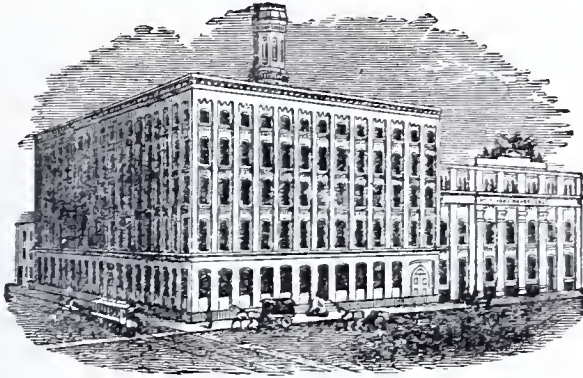
PHILADELPHIA.

(P. O. Address—FRANKFORD, PHILA.)

ESTABLISHED 1815.

HORSTMANN BROTHERS & CO.

Fifth and Cherry Streets, Philadelphia,



Manufactory and Salesrooms.

MANUFACTURERS AND IMPORTERS OF

Military, Society Regalia, Church & Theatrical Goods,

KNIGHTS TEMPLAR UNIFORMS A SPECIALTY.

BANNERS, FLAGS, DECORATIONS AND BADGES.

We keep constantly on hand a large and varied assortment of

MATERIALS AND TRIMMINGS

Suited to all the above branches.

A LARGE ASSORTMENT OF

Silk, Bunting and Muslin Flags

ON HAND AND MADE TO ORDER. ALSO,

BANNER SILKS, BUNTING, STAFFS, EAGLES, ORNAMENTS, SPEARS,

Balls, Cords, & Tassels, Fringes, Covers, Belts,

And all Articles needed for Flag and Banner Trimming.

THE TRADE SUPPLIED.

 *Mail orders and inquiries shall have prompt attention.*

HORSTMANN BROTHERS & CO.

PHILADELPHIA, PA.

SCHOMACKER GRAND, SQUARE, & UPRIGHT PIANOS

These Celebrated Instruments have been awarded THE PRIZE MEDAL

OF THE

INDUSTRY OF ALL NATIONS,

And are fully indorsed by the following Eminent Artists :

Prof. Carl Wolfsohn,

" Michael H. Cross,

" A. Berens,

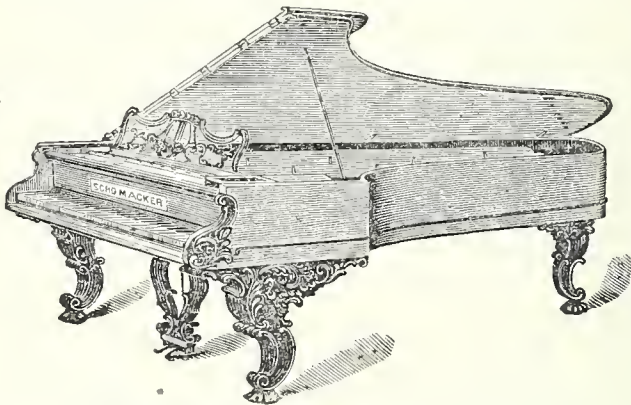
" Jean Louis,

" Mark Hassler,

" George Vogt,

" Carl De Butna,

" H. G. Thunder,



Prof. Pasq. Rondinella

" Joseph Knecht,

" F. D'Auria,

" Carl Sentz,

" Simon Hassler,

" Wm. G. Vogt,

" H. L. Connelly,

" Wm. J. Lemon,

AND MANY OTHERS.

Our prices are moderate, and every instrument is warranted to give satisfaction.

Send for our Illustrated Catalogue, containing full particulars, with description, prices, etc. Mailed free on application.

SCHOMACKER PIANO FORTE MANUF'G CO.,

Warerooms, 1103 CHESTNUT STREET, Phila.

Charles Albrecht.

Frederick Riekcs.

Edmund Wolsieffer.

ALBRECHT & CO.,

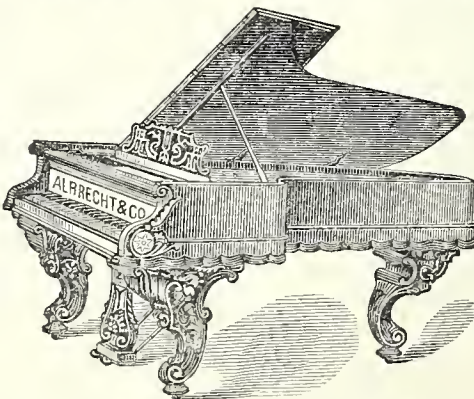
THE PHILADELPHIA

PIANO MANUFACTURERS.

FIRST-CLASS

Grand & Square
PIANOS.

Every Instrument
Warranted.



A LARGE STOCK
TO

SELECT FROM.

Reasonable in Price

Salesrooms, 610 Arch Street, Philadelphia.

USED AT THE WOLSIEFFER CONCERTS.

WHOLESALE AND RETAIL.

J. B. LIPPINCOTT & CO.
PUBLISHERS, BOOKSELLERS,

Importers and Stationers,

715 and 717 MARKET STREET, PHILADELPHIA,

Invite the attention of the Public to their ESTABLISHMENT, which has been
ENLARGED and IMPROVED by extensive additions, and now presents

Unequaled Facilities for the Examination and Purchase of
MISCELLANEOUS BOOKS,
IN EVERY DEPARTMENT OF LITERATURE.

Also, a LARGE ASSORTMENT of

Foreign and Domestic Stationery

Particular attention given to JOB PRINTING and the MANUFACTURE OF
BLANK BOOKS to special order ON THE MOST FAVORABLE TERMS.

PUBLISHERS OF
LIPPINCOTT'S MAGAZINE.

An Illustrated Monthly of Popular Literature and Science.

PARIS--1867.

VIENNA--1873.

F. SACHSE & SON,

TRADE



MARK.

S. E. COR. EIGHTH AND VINE STS., PHILADELPHIA,

SHIRT MAKERS,

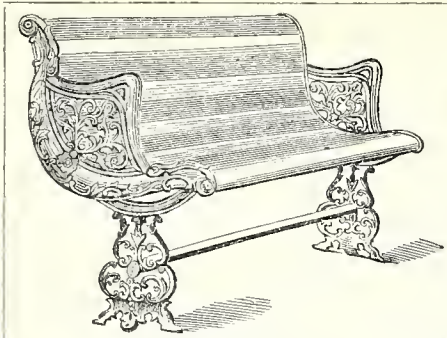
Call the attention of Gentlemen to their Superior cut of

FINE DRESS SHIRTS,

Unrivalled in ease and comfort of fit. Unexcelled in quality and workmanship.

Price for best grade, Six Shirts for \$16.50.

Prize Medals, Exposition Universelle, Paris, 1867. Welt Ausstellung, Vienna, 1873.

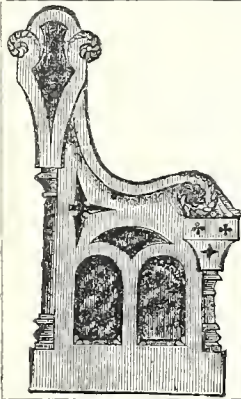


The BANCROFT
Improved
Reversible Settee,
With Curved Back and Seat,

FOR SUNDAY SCHOOL AND ASSEMBLY ROOMS.

This new, novel and complete Settee is constructed on purely physiological principles. The back and seat form a continuous curvature, which fits the body exactly. In reversing, the back *swings under* instead of *over*, and in turn becomes the seat; valuable features are thus secured that are *unknown in any other Settee*, with an entire *absence of complicated mechanism*.

Do not fail to send for full descriptive catalogue before deciding on other styles.
Now being adopted in Leading Churches of the Country.



J. A. BANCROFT & Co.

512 Arch & 511 North Sts.

PHILADELPHIA

SCHOOL

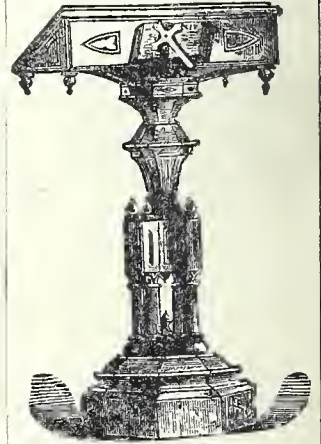
AND

Church Furniture.

Day and Sunday School
SUPPLIES
Of every Description.

Architects Designs a Specialty.

Send for Illustrated and Descriptive Catalogues



J. GOLDSBOROUGH,

PATENT IMPROVED

Ribbon Machine Stamp,

FOR

BANKS, RAILROAD OFFICES,
SOCIETIES, LODGES,

POST OFFICES,
RAILROAD STATIONS,

Express Companies, &c.

SEALING WAX SEALS,

DATING TYPE.

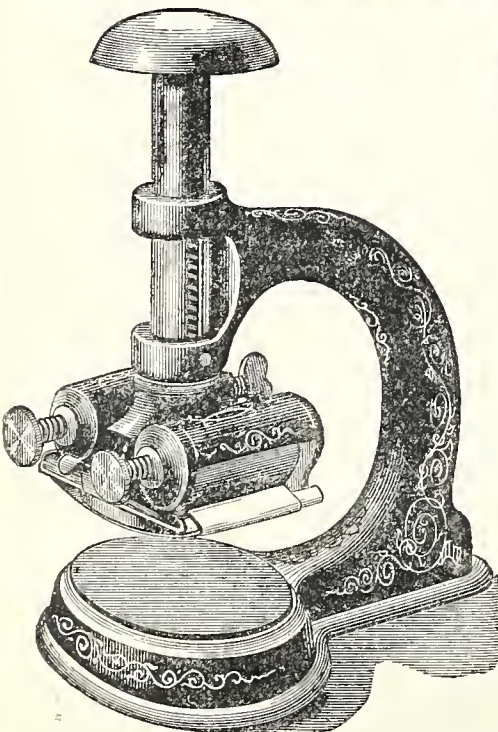
Seal Presses, Dies, &c.

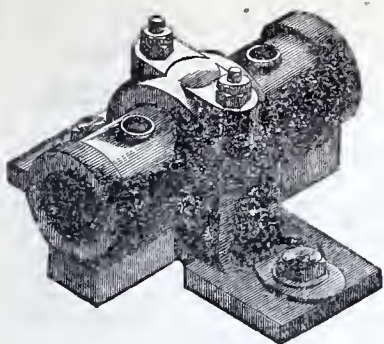
Ribbons and New Dies.

Patented May 12, 1874.

No. 19 South Ninth St.

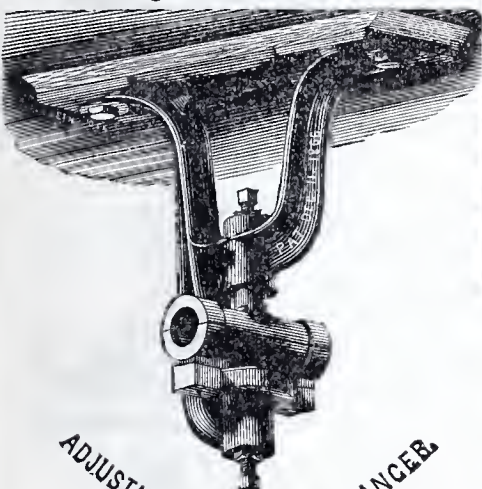
In Ninth St. Ten Doors North of Continental Hotel.



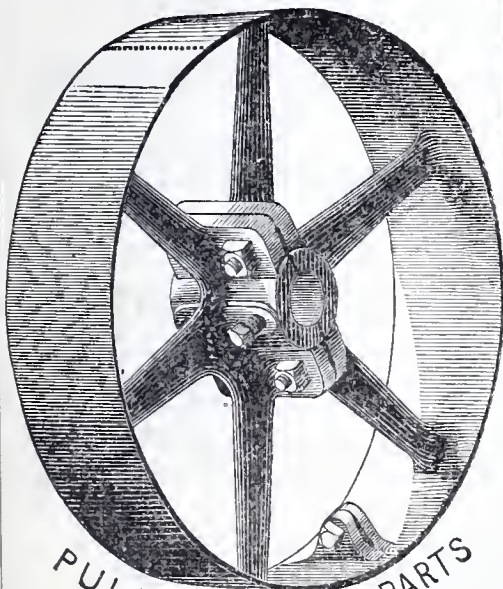


**Ball and Socket
Self-Oiling Pillow Block.**

Shafting!



ADJUSTABLE SELF-OILING HANGER.



PULLEY IN TWO PARTS

FAIRMOUNT MACHINE WORKS,
Office, 2106 WOOD St., Philadelphia.

Manufactures as Specialties

POWER LOOMS,

*SPOOLING, BEAMING, DYEING and
Sizing Machines.*

PATENT BOBBIN WINDING MACHINES

wind direct from
hank or skein to shuttle bobbin.

SHAFTING

With Patent Adjustable self-oiling Bearings.

Adjustable Self-Oiling Hangers,

8, 10, 12, 15 and 18 in. drop,

Ball and Socket Self-Oiling Pillow Blocks.

Pulleys, from 4 inch to 10 feet in diameter.

Pulleys made in two parts,

any size required.

SELF-ACTING WOOL-SCOURING MACHINES,

LARD AND PARAFFINE OIL PRESSES.

Improved

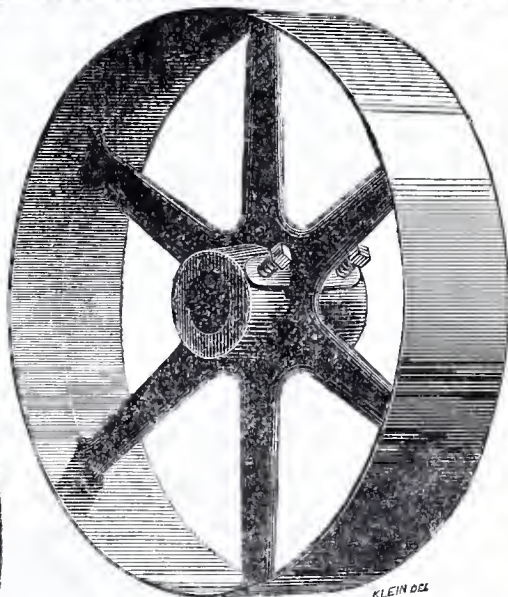
Power Hoisting Machines.

Machine and Foundry Work in all
their branches.

*Plans taken, and Factories fitted out com-
plete with shafting and Gearing*

Send for list of Pulleys, &c.

THOMAS WOOD.



KLEIN DEL

**Pulleys from 4 inches to 10 feet
in Diameter.**

SHAFTING,

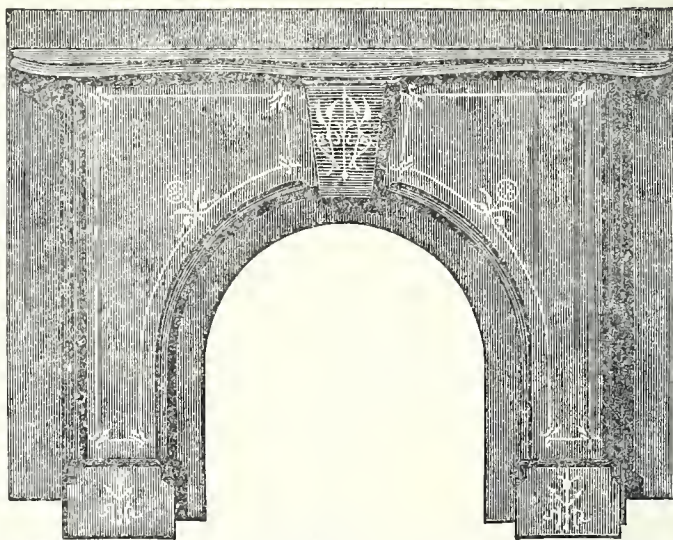
With Patent Adjustable
Self-oiling Bearings.

The above require oiling
but once in from
three to four months.

SHAFTING furnished with Plate, Cone Band or with Porter's
Celebrated Patent Clamp Couplings, as ordered.

1776. CENTENNIAL 1876.
KEYSTONE SLATE MANTEL and SLATE WORKS.
 ESTABLISHED 1853.

**LOW DOWN AND RAISED
 FIRE GRATES,**
 For Burning Hard or Soft Coal.



**PATENT WARM-AIR
 REGISTERS,
 VENTILATORS, &c.**

SLATE MANTELS of the **LATEST** and **MOST BEAUTIFUL** Designs
 And other Slate Works on Hand or Made to Order.
TILING AND FLAGGING, &c.
WILSON & MILLER,
 1210 Ridge Ave., and 1211 and 1213 Spring Garden St., Phila.

EVERY FAMILY SHOULD USE
WRIGHT'S
"NE PLUS ULTRA"
MINCED MEAT,
 Depot, Spring Garden and Franklin Sts.

I am yours, very truly

JOSHUA WRIGHT.

BOYD'S "AROMA" COFFEE.
BOYD'S "AROMA" ROASTER,

Patented September 2d, 1874.

BOYD'S "AROMA" COOLER,

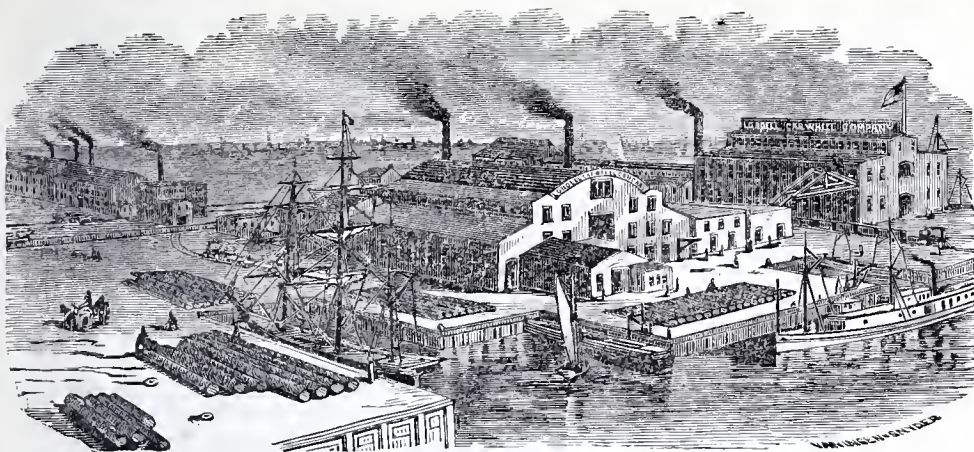
Patented March 25th, 1874.

G. BOYD & CO.

1142 and 1209 Market Street, Philadelphia.

ESTABLISHED

IN 1836.



LOBDELL CAR WHEEL COMPANY,

WILMINGTON, DELAWARE.

MANUFACTURERS OF

Chilled Railroad Car Wheels
AND
CHILLED ROLLS,

For Paper, Rubber, Brass, Copper, Rolling Mills, &c.

G. G. LOBDELL, Pres't.

W. W. LOBDELL, Sec'y.

P. N. BRENNAN, Treas.

It will Pay Exhibitors and others to Order their

PRINTING

FROM

JACKSON BROTHERS

404 Library St., Philadelphia.

ELLIS B. REEVES,
Stationery and Blank Books
No. 30 South Third Street,
PHILADELPHIA.

Estimates Furnished and Information given on application.

CALL AND LEAVE YOUR ORDERS.

DELAWARE MUTUAL

Safety Insurance Co.

OFFICE,
Southeast Corner Third and Walnut Sts.
PHILADELPHIA.

Marine Insurances

On Vessels, Cargo and Freight to all parts of
the World.

Inland Insurances

On Goods, by River, Canal and Land Carriage to
all parts of the Union.

Fire Insurances

On Merchandise generally--on Stores, Dwelling
Houses, &c. &c.

Assets of the Company November 1, 1873.

\$100,000	United States Six Per Cent. Loan, 1897.....	\$108,750 00
200,000	State of Pennsylvania Six Per Cent. Loans.....	212,360 00
325,000	City of Philadelphia Six Per Cent. Loans, (exempt from tax,).....	327,325 00
164,000	State of New Jersey Six Per Cent. Loans.....	167,280 00
20,000	Pennsylvania Railroad First Mortgage Six Per Cent. Bonds.....	19,400 00
25,000	Pennsylvania Railroad Second Mortgage Six Per Cent. Bonds.....	23,750 00
25,000	Western Pennsylvania Railroad Mortgage, [Penna. R. R. guarantee,]..	20,000 00
30,000	State of Tennessee Five Per Cent. Loan.....	20,700 00
7,000	State of Tennessee Six Per Cent. Loan.....	4,830 00
19,000	Pennsylvania Railroad Company, [380 shares stock,]	16,957 00
5,750	North Pennsylvania Railroad Company, [115 shares stock,]	5,405 00
10,000	Philadelphia and Southern Mail Steamship Company, 80 shares stock..	4,000 00
40,000	American Steamship Company Six Per Cent. Bonds	28,000 00
236,950	Loans on Bond and Mortgage, first liens on City Properties,.....	236,950 00
\$1,207,700 Par.		Market Value, \$1,195,707 00
Real Estate.....		70,000 00
Bills Receivable for Insurances made.....		208,700 41
Balances due at Agencies, Premiums on Marine Policies, Accrued Interest and other debts due to the Company.....		80,135 88
Stock and Scrip, etc., of sundry corporations, \$10,673. Estimated value.		6,105 00
Cash.....		89,261 54

\$1,649,909 83

DIRECTORS.

THOMAS C. HAND,
JOSEPH H. SEAL,
JAMES C. HAND,
HUGH CRAIG,
EDW. DARLINGTON,
JACOB P. JONES,
WM. G. BOULTON,
JOHN H. MICHENER,

JAS. B. McFARLAND,
WM. C. LUDWIG,
JACOB RIEGEL,
JOHN D. FAYLOR,
SAMUEL E. STOKES,
GEO. W. BERNADOU,
WM. C. HOUSTON,
H. FRANK ROBINSON,
JAMES TRAQUAIR,

THOS. P. STOTESBURY,
HENRY P. SLOAN,
J. H. CATHERGOOD,
H. JONES BROOKE,
SPENCER MILVAINE,
D. T. MORGAN, Pittsb'g
A. B. BERGER, "
EDW. LAFOURCADE.

THOMAS C. HAND, President.

HENRY LYLURN SECRETARY.

HENRY BALL, Ass't SECRETARY.

THE
PENN MUTUAL
 LIFE INSURANCE COMPANY,
No. 921 CHESTNUT STREET,
 PHILADELPHIA.

A Purely  *Dividends*
Mutual Company, *Declared Annually.*
Incorporated in 1847. *Assets, . \$4,550,000.*

THE PENN is Entirely Mutual.

All of its Surplus Premiums are returned to its members every year to reduce the payments, or they may be used to increase the amount insured.

Its Policies are all non-forfeitable for their value after the third annual payment.

SAMUEL C. HUEY, President.
 SAM'L E. STOKES, Vice President. H. S. STEPHENS, 2d Vice-President.
 JAMES WEIR MASON, Actuary. HENRY AUSTIE, Secretary.

THE GIRARD
 Life Insurance, Annuity and Trust Co.
 OF PHILADELPHIA.
Nos. 633 and 635 Chestnut Street.
Assets over \$5,000,000.

The oldest Company of the kind but one in this State, continue to **Insure Lives** on the most reasonable terms, and declare Profits to the insured for the whole of Life. Premiums paid yearly, half yearly or quarterly.

They receive Trusts of all kinds, whether as Trustees, Assignees, Guardians, or Committee of Lunacy; also act as Executors and Administrators, to the duties of which particular attention is paid by old and experienced hands.

Deposits and Trust Funds are not, in any event, liable for the debts or obligations of the Company, being kept entirely separate.

Charter Perpetual. INTEREST ALLOWED ON DEPOSITS.

MANAGERS

Thomas Ridgway,
 George Taber,
 Seth I. Comly,
 Henry G. Freeman,
 Wm. P. Jenks,

Thomas H. Powers,
 H. N. Burroughs,
 Charles Wheeler,
 Edward C. Knight,
 Isaac Jeanes,

Thomas Smith,
 John A. Brown, Jr.
 Robert Gray,
 Edward Starr.

THOMAS RIDGWAY, PRESIDENT.

S. I. COMLY, VICE-PRESIDENT.
 WM. H. STOEVER, TREASURER.

CHAS. O. GROOME, ACTUARY.
 CALEB CLOTHIER, SECRETARY.

PORTER & COATES,

Publishers, Importers and Booksellers,

822 Chestnut Street,
PHILADELPHIA.

In our **RETAIL DEPARTMENT** will be found always a stock particularly rich in RARE, SCARCE AND CURIOUS BOOKS, handsome illustrated works, and books in fine bindings; PRICED CATALOGUES are issued from time to time, and will be sent regularly, free to any address.

All the NEW AND STANDARD PUBLICATIONS, ENGLISH AND AMERICAN, are also kept always in stock.

Mail orders filled promptly.

Books imported to order;—importations made weekly.

THE LARGEST AND BEST STOCK OF BOOKS
EVER COLLECTED IN PHILADELPHIA,
AT THE LOWEST PRICES.

PRACTICAL BOOKS

FOR CIVIL AND OTHER ENGINEERS, RAILROAD MEN AND MECHANICS.

Roper's Hand Book of the Locomotive, including the Construction, Running and Management of Locomotive Engines and Boilers. With illustrations. By Stephen Roper, Engineer. 18mo. Pocket Form. Mor. tuck. Price \$2.50.

Roper's Catechism of Steam Engines and Steam Boilers. Third Edition. Third Thousand. Revised. 18mo. Mor. Tuck. Pocket Form. Price \$2.

Trautwine's Civil Engineer's Pocket Book of Mensuration, Trigonometry, Surveying, Hydraulics, Hydrostatics, Instruments and their adjustments, Strength of Materials, Masonry, Principles of Wooden and Iron Roof and Bridge Trusses, Stone Bridges and Culverts, Trestles, Pillars, Suspension Bridges, Dams, Railroads, Turnouts, Turning Platforms, Water Stations, Cost of Earthwork, Foundations, Retaining Walls, etc., etc., etc. In addition to which the elucidation of certain important Principles of Construction is made in a more simple manner than heretofore. By John C. Trautwine, Civil Engineer. With over 650 illustrations from original designs. 16mo., 650 pages. Mor. Tuck. Third Edition. Eighth Thousand. Revised Pocket Form. Price \$5.

Trautwine's Field Practice of Laying out Circular Curves for Railroads. Pocket Form. 12mo. Roan tuck. Ninth Edition. Revised and enlarged. Price \$2.

Trautwine's New Method of Calculating the Cubic Contents of Excavations and Embankments, by the aid of diagrams; together with directions for estimating the cost of earthwork. Fifth Edition. Completely revised and enlarged. 8vo. Cloth. Price \$2.

Riddell's Practical Carpenter and Joiner. Containing 32 plates, 8 of which are on card-board mounted on linen, showing actual construction. (An entirely new work.) Folio, cloth. Price \$10.

Riddell's New Elements of Hand Railing. Revised edition, containing 41 plates. Giving a complete elucidation of the art of Stair-Building. Folio, cloth. Price \$7.

Overman's Mechanics for the Millwright, Engineer, Machinist, Civil Engineer and Architect. By Frederick Overman. 150 illustrations. 12mo. cloth. Price \$1.50.

For sale by booksellers generally, or sent upon receipt of the price.

SEND FOR OUR CATALOGUE.

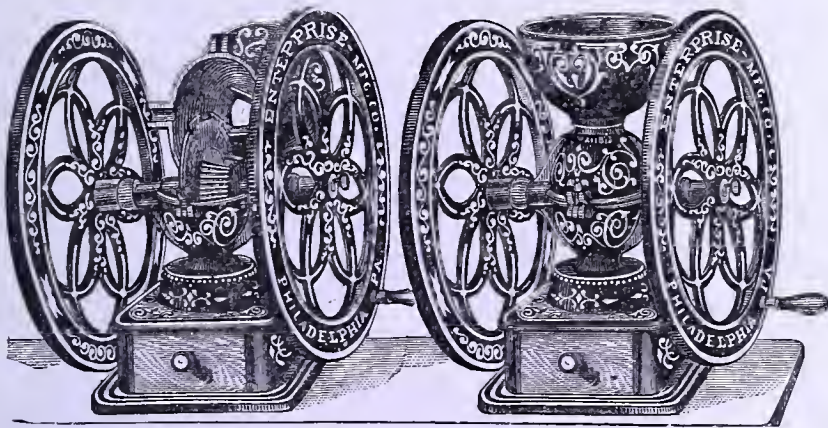
CLAXTON, REMSEN & HAFFELFINGER, Publishers,
624, 626 & 628 MARKET ST., PHILADELPHIA.

American Coffee, Drug and Spice Mills.

Can be opened in centre and Cutters taken out for cleaning in 1 minute.

BEST COFFEE AND SPICE MILLS KNOWN.

BEST DRUG MILLS KNOWN.



SHOWING MILL OPEN.

SHOWING MILL CLOSED.

Send for Illustrated Catalogue, containing twenty styles of Mills and other useful articles for Grocers and Druggists.

ENTERPRISE MANUFACTURING CO. OF PA.

S. W. Cor. American and Dauphin Sts., Philadelphia, Pa.

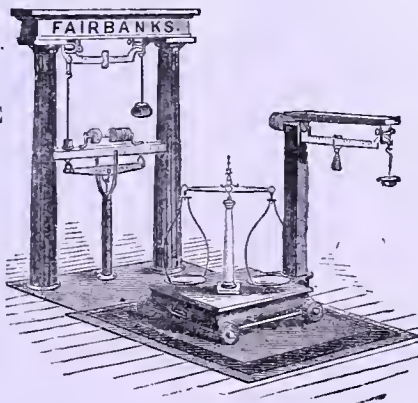
Fairbanks' Scales,

ADAPTED TO THE STANDARD OF ALL NATIONS.

AWARDED
THE HIGHEST PRIZE

AT
PARIS,
1867,

In competition with 34
manufacturers



AWARDED
THE HIGHEST PRIZE

AT
VIENNA,
1873,

In competition with the
whole World.

The Imperial Order of Francis Joseph was conferred, by the Emperor of Austria,
upon the

INVENTOR OF FAIRBANKS' SCALES.

FAIRBANKS & EWING, 715 Chestnut St., Philada.

HARRISON BROS. & CO:
CORRODERS AND OXYDIZERS
OF
LEAD:
COLOR MAKERS,

AND MANUFACTURERS OF

*Oil Vitriol, Nitric, Muriatic & Acetic Acids,
Alum, Sugar of Lead & other Chemicals.*

THE FOLLOWING GUARANTEE IS PLACED ON EVERY PACKAGE
OF THEIR

PURE

We guarantee
the contents of this
package to be perfectly
PURE WHITE LEAD,
Ground in Bleached Linseed Oil,
and will pay \$250.00 and cost
of Analysis for every ounce
of Adulteration found
therein.

Harrison Bros. & Co.

LEAD

OFFICES:

105 South Front Street, Philadelphia.

179 Water Street, New York.

CONNECTED WITH THEIR FACTORIES BY 125 MILES OF PRIVATE TELEGRAPH WIRE.

TO VISITORS!

Do not fail to examine their display of Colors, &c. Paint Dealers, Druggists, Builders, Painters, and all who buy Paint, will be furnished with circulars and samples.